

The Role of Geography in Human Security: A Case Study of Gilgit-Baltistan

PhD Thesis



Submitted by

Ehsan Mehmood Khan, PhD Scholar

Regn. No. NDU-PCS/PhD-13/F-017

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Department of Peace and Conflict Studies (PCS)

Faculties of Contemporary Studies (FCS)

National Defence University (NDU)

Islamabad

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*This Dissertation is submitted to National Defence University,
Islamabad in fulfilment for the degree of Doctor of
Philosophy in Peace and Conflict Studies*

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**Thesis submitted in fulfilment of the requirement for
Doctor of Philosophy in
Peace and Conflict Studies (PCS)**

**Peace and Conflict Studies (PCS) Department
NATIONAL DEFENCE UNIVERSITY
Islamabad- Pakistan
2017**

CERTIFICATE OF COMPLETION

It is certified that the dissertation titled “The Role of Geography in Human Security: A Case Study of Gilgit-Baltistan” written by Ehsan Mehmood Khan is based on original research and may be accepted towards the fulfilment of PhD Degree in Peace and Conflict Studies (PCS).

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Countersigned By

(Controller of Examinations)

(Head of the Department)

AUTHOR'S DECLARATION

I hereby declare that this thesis titled “**The Role of Geography in Human Security: A Case Study of Gilgit-Baltistan**” is based on my own research work. Sources of information have been acknowledged and a reference list has been appended. The material contained herein has not been previously submitted either whole or in part for a degree at any university.

Ehsan Mehmood Khan, PhD Scholar

SUPERVISOR'S DECLARATION

This thesis titled “**The Role of Geography in Human Security: A Case Study of Gilgit-Baltistan**”, submitted by Ehsan Mehmood Khan, is supervised by me. The thesis comes up to the requirements for the award of PhD degree in Peace and Conflict Studies (PCS).

Supervisor

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ABSTRACT

“The Role of Geography in Human Security: A Case Study of Gilgit-Baltistan”

The research on “The Role of Geography in Human Security: A Case Study of Gilgit-Baltistan” primarily focuses on the function of geography both as an impediment and expedient for human security in the region. It explores into the risks posed by geography as well as the dividends that may be accrued for improvement of human security profile and in turn the peace and conflict state in the region. Mixed method, i.e. a combination of quantitative and qualitative research techniques, has been used. The theoretical framework of geo-humanism has been evolved to determine the role of geography in human security. The matrix of geo-humanism includes geography-technology-governance (GTG) process to improve the human security profile of a region.

The physical geography of Gilgit-Baltistan has been analyzed in the light of the five themes of geography adopted by the Association of American Geographers in 1984 to include location, place, movement, human-environment interaction and region. The interaction of geography has been studied in the light of seven subsets of human security as enunciated in the United Nations Development Programme’s Human Development Report of 1997. Details of human geography and contextual makeup of GB include historical perspective, administrative structure, sectarian profile, linguistic makeup, ethnic profile, the cultural geography, and the interaction between geography, history and culture. The theoretical framework of geo-humanism has been applied to GB as a case study. Public opinion based on the survey, using a mixed method to include cluster and random survey techniques, has been carried out in GB region, which verify a number of key assumptions and validates key assumptions. Findings of the study validate the hypothesis.

The findings of the dissertation confirm a strong role of geography in human security makeup of the GB region, and governance and technology as the remedies. Political security is greatly influenced by geography in a number of ways. Economic security of GB is primarily dependent on the geographic dividends or difficulties. Food security, which has its roots in agriculture, is purely dependent on geo-climatic conditions of the region. Geo-climatic conditions have both positive and negative effects on health security profile of the region.

DEDICATED TO

The passionate, peace-loving and strong-willed people of Gilgit-Baltistan, who have been braving the rigours of geography for centuries to attain and maintain a desired level of human security.

ACKNOWLEDGEMENT

In first place, I would like to extend my profound gratitude to my thesis supervisor Dr Muhammad Khan for his perpetual guidance without which I would not have been able to complete this thesis. His supervision and scholarly direction is also expected to guide me in my future academic pursuits.

For completion of this work, I also owe plenty of gratitude to the scholars, academics and experts whose publications on the issue have been valuable in the course of research. I am particularly thankful to the few whose work was valuable in data collection, analysis of various aspects and bringing in pertinent conclusions. It would be remiss of me if I did not mention the wholehearted support from the scholars and journalist community of Gilgit-Baltistan who offered candid comments during countless discussions that we had on this research work. I must mention the support and guidance of Yousaf Hussainabadi, a renowned historian from Baltistan, Qasim Naseem, a celebrated author and editor of Weekly Siachen News, Muhammad Hassan Hasrat, a prolific author and ex Regional Director of Allama Iqbal Open University, Skardu Campus Professor (emeritus) Usman Ali, an accomplished historian from Gilgit, Professor (emeritus) Manzooq Ali, a celebrated scholar of geography from Gilgit, Assistant Professor Haji Karim Khan from the Karakoram International University (KIU), Skardu Campus, and my friends from the field of media and journalism.

I must also extend my gratitude to Haji Fida Muhammad Nashad, Speaker Gilgit-Baltistan Legislative Assembly (GBLA), with whom I had a number of sessions for academic discussion on the subject, and who made it possible to get the opinion survey forms filled from all members of GBLA. I specially thank Wazir Muhammad Jaffar, Lecturer in Government Degree College Skardu, Muhammad Ismail, Principal Inter College Shigar, and Muhammad Hussain Jaffri from Askole in Braldu valley, who provided a lot of empirical data. I also thank the government officials from various departments at Gilgit, Skardu and other districts, who shared official information and data for analysis. I must also thank my friends Liaquat Hussain, Zahid Nawaz Malik, Salman Rehmat and Muzammal Azad for unfailing support in the course of research.

I am grateful to the people of Gilgit-Baltistan, many of whom filled the opinion survey forms, and many more shared their views, experiences and empirical observations in the form of informal and focus group discussions, some of which has become inescapable part of the thesis.

Ehsan Mehmood Khan,
PhD Scholar
June 13, 2017

Chapter-1

INTRODUCTION

“Because man lives on the earth, he depends on the earth.”

– Jean Brunhes¹

Geography is the mother discipline of a number of natural and social science subjects. It is bedrock of international relations when considered in terms of geopolitics and geo-strategy. It is substratum of the state of peace and conflict in any region of the world. On the other hand, human security has become a global issue and is being dealt with by various international forums including the United Nations (UN). As a matter of fact, the human security concerns travelled in a top-down manner: from the UN to its member states. Human security which itself serves as the basis of the state of peace draws heavily from geography of a given region. Geography serves both as impediment and expedient for human security. On the one hand, it shores up the state of human security by means of its natural dividends; on the other; it adds to the risk by posing danger to various facets and features of human security.

The geography of Pakistan is a remarkable mix of glaciated region, snow capped mountains, fertile plains, vast deserts and long waterways.² All these geographic landscapes play a significant role in socio-economic life of the country. Indus valley based on the Indus River provides for a geographic definition of Pakistan. Different scholars have contrasting viewpoints with regard to the role being played by geography in makeup and functioning of Pakistan. For instance, Robert D. Kaplan considered Pakistan to be one of the two most illogically conceived states in the world, along with Iraq.³ To others, geography makes a natural case for Pakistan as a state and is a defining attribute. For example, Barrister Aitzaz Ahsan debates the

¹ Jean Brunhes, *Human Geography*, Abridged, Trans. Ernest F. Row (London: George G. Harrap and Coy, 1952), 226 quoted in Rajendra Kumar Sharma, *Fundamentals of Sociology* (Delhi: Atlantic Publishers, 2007), 104.

² Pakistan can be divided into ten geo-ecological zones: the Indus Delta with arid tropical marine climate; the Southern Irrigated Plains with continental climate; the Sandy Desert with arid subtropical climate; the Northern Irrigated Plains with semi-arid subtropical climate; the Barani Lands with semi-arid climate; the Wet Mountains where mean daily temperature in summer is about 35° C; the Northern Dry Mountains covered with snow; the Western Dry Mountains comprising semi-arid highlands; the Dry Western Plateau with arid tropical climate; and the Suleman Piedmont with subtropical continental, arid and hot climate. For details see Dr Dost Muhammad, “Country Pasture/Forage Resource Profiles,” *Food and Agriculture Organization*, <http://www.fao.org/ag/AGP/AGPC/doc/Counprof/Pakistan.htm#1> (accessed October 31, 2014).

³ Robert D. Kaplan, *The Revenge of Geography* (New York: Random House, 2012), 32.

issue in geo-historic perspective and considers the present day Pakistan to be an ancient reality based somewhat on the same geographical bounds.⁴ At any rate, these perspectives corroborate the reality that geography acts as a fulcrum for Pakistan, both as a state and society and connects it with history, shapes its society, polity and economy, and keeps its various federating units together.

Gilgit-Baltistan (GB) is the northern most region of Pakistan – a federating unit with distinct status. Human security profile and conditions of GB are different from remaining parts of Pakistan and other adjoining regions. The key difference is that of the geography, which is playing a consequential role in virtually all spheres of human security in the region from political to economic, food to health, personal to community, and environmental security. As a matter of fact, GB is thought of in terms of its geography in various manners. Not only the geographic makeup but also the location, climatic conditions and composition of human geography contribute in the human security construct of the of the GB region.

The United Nations Development Programme (UNDP), in its Human Development Report (HDR) – 1994, explained human security in terms of seven subsets to include economic, political, food, health, environmental, personal and community security. Since then, it has become a global human security paradigm, and is playing its part in international relations. On the other hand, human security serves as physical, psychological and social arena for conflict and peace approaches in a given region.

The economic security of GB is primarily dependent on the geographic dividends or difficulties in various parts of the region. Political security is greatly influenced by geography in a number of ways. Food security, which has its roots in agriculture, is purely dependent on geo-climatic conditions of the region. Environmental security is entirely a function of geography. A number of natural hazards that pose substantial challenges to environmental security in the region emanate from the geographic conditions of GB, including the changing climate. The personal and community security, which fall in the realm of “peace and conflict” are also influenced by geography of the area to a considerable extent.

⁴ Aitzaz Ahsan, *The Indus Saga and the Making of Pakistan* (Oxford: Oxford University Press, 1996) provides a detailed and novel perspective.

Geography has also influenced the course of history in GB region both in terms of state security and human security. As for state security, the geography of GB has been seen as an arena of strategic competition between the two erstwhile powers in Asia and Eurasia: the Victorian British Empire and the Tsarist Russian Empire. The term Great Game was used to describe “the Anglo-Russian imperial competition and conflict in Central Asia during the nineteenth century, and has been described as the Cold War of the Victorian Era.”⁵ GB was seen as one of the buffers between the two empires in addition to Afghanistan. The princely state of Hunza had gained singular importance in the Great Game. The remaining areas of GB were proportionally affected in keeping with their geographic contiguity. This imperial security (state security as per our current understanding), in turn, affected the human security landscape in the region.

GB’s location dynamic – both absolute and relative – has its own magnitude of dividend. The ancient Silk Route that linked China with South Asia and beyond passed through GB. It had a significant effect on human security. The upcoming China-Pakistan Economic Corridor (CPEC) enters Pakistan through GB. It would also connect various other adjoining regions using GB as a geographic conduit. This, too, would have an impact, quite positive, on human security profile of the region.

The five themes of geography espoused by the Association of American Geographers, which include location, place, human-environment interaction, movement and region, are wholly applicable to GB and are all relevant to human security of the region in their own characteristic way. The theory of Environmental Possibilism is also useful to study the case of GB with regard to the effects of geography on human security. All this, however, has to be linked with the seven subsets of human security given by the UNDP in the HDR-1994. When a concrete linkage between geography and human security is discovered, it makes a strong case for a new catchword underpinning a new theoretical construct and a new way of thinking: Geo-humanism. Geo-humanism views human security through the prism of geography, thereby adding a new dimension to the Human Security Studies.

Certainly, there are extra-geographical forces that can help minimize the challenges posed by geography and maximize its dividends. Technology is the key

⁵ Eugene L. Rasor, *Winston S. Churchill, 1874-1965: A Comprehensive Historiography and Annotated Bibliography (Bibliographies of World Leaders)* (London: Greenwood, 2002), 276.

facet, which has been employed through various governance approaches in the developed countries. It is, however, of note that irrespective of the technological and governance response, the effect of geography remains overriding in shaping the human security profile of a region. For instance, both in developed and developing countries, the cost of human security in the mountainous regions is comparably more than plains and deserts. The case of GB is no different in Pakistan's geo-administrative perspective.

This thesis is an effort to explore the axioms, paradoxes, realities and complexities of geo-humanism.

Statement of the Problem

Geography is the basis of human security in a region. However, neither human security nor its linkage with geography is well understood the case of Gilgit-Baltistan region of Pakistan.

Human security is an evolving paradigm of security, which stands parallel to the traditional security paradigm besides complementing it in a number of ways. It has, hitherto, been studied in terms of human development, which is certainly right. However, the causal relationship between geography and human security has not been studied in a bid to formulate national or international responses to human insecurities in various geographic regions fittingly. It is considered that the tougher the geography of a region, the costlier the response to human security. Gilgit-Baltistan is a case in point. Located between the highest watersheds in the world, the region suffers from various kinds of human insecurities more than other regions of the country, yet the state response is just lukewarm. The state lacks a correct diagnosis of the roots of human insecurities in Gilgit-Baltistan region. Even though geography has been studied for its interaction with humankind – actually human geography is an equal partner with physical geography – geography's linkage with human security remains a knowledge gap which needs to be filled. Indeed, this is where the problem in the human security system of Pakistan, not so declared, lies. The problems posed by geography precede the state response in the form of governance and usage of technology. The extent to which geography influences human security in the GB region remains a researchable area. Besides having a normative and practical value, it is also of significance from a theoretical point of view in the form of geo-humanism.

Human security, *per se*, is a fairly new concept despite the fact that human needs and human security imperatives existed on the planet earth since the inception

of humankind. The concept is still at nascent stage insofar as Pakistan is concerned. Virtually all areas of the country are suffering from various kinds of human insecurities. Nevertheless, the case of GB is different from other parts and provinces of the country. Human security in GB is by and large a product of geography. Actually, geography affects human security in all regions of the world but certainly the peculiar geographic conditions of the GB region have caused unique human security circumstances. This is where geography and human security meet and has been termed geo-humanism in this paper as a new theoretical concept. It needs to be studied in exhaustive details so as to be able to devise an appropriate human security response at national, regional and international levels. Diagnosis is the mainstay of this research work in the form of conclusions and findings so as to suggest practicable responses.

Significance and Scope of the Study

The Role of Geography in Human Security: A Case Study of Gilgit-Baltistan is a multidisciplinary study. Geography per se is the bedrock of international relations, strategic security studies, political science and sociology. Geography is the foundation of the subjects like geo-politics, geo-strategy and geo-economics. Geography is also the base of geo-humanism, the nucleus of this study. Not only that all these subjects are academically interlinked but also related to each other in normative and practical domain. Geography is also an important facet of Peace and Conflict Studies (PCS) as each conflict takes place in a given geographical space, under certain geographic imperatives and impulses.

Human Security, on the other hand, is the core of Peace and Conflict. Human security acts as a powerful driver of peace whereas human insecurity serves as cannon fodder of conflict. Nothing ensures peace more than a contented and human-secured population. Besides, human security is one of the fresh approaches being used in International Relations especially from various platform of the United Nations. Powerful state and non-state actors are using human security as a tool of diplomacy and soft power.

Human security, despite being a relatively new subject, has been studied from various angles and perspectives. To study it with reference to the role of geography is a fresh approach. It is expected to fill the existing knowledge gap as geography being the predominant feature of GB region has never been studied as a driver, foundational element or primary building block of human security therein. The study is also

expected to serve as a major breakthrough in determining geo-humanism in GB region thereby leading to a desired degree of awareness among the policymakers and civil society of Pakistan in general and GB in particular. It could pave the way for more debate, analysis, research and eventually lead towards geography-driven human security in Gilgit-Baltistan. It is expected that this study will open new vistas of research within the subject of human security in the disciplines of Peace and Conflict Studies (PCS), International Relations (IR), Strategic Security Studies (SSS) and Human Security Studies (HSS).

Readership and Target Audiences

Intended readers and target audience include: policy planners, the experts of peace and conflict studies, security analysts, human security experts, economists and traders, geographers, environmentalists, civil society, strategists, scholars and students.

Relevance of the Study

Due to unique facets and features of geography, the Gilgit-Baltistan region is significant not only within Pakistan but also in the highlands of Asia containing a number of regions located in South Asia, Central Asia and China. It has gained added importance in the wake of China-Pakistan Economic Corridor (CPEC), wherein GB has emerged as the snout of this corridor within Pakistan. GB has been a conduit of an erstwhile historic trade corridor in the region: the Silk Route. Nevertheless, the state of human development in GB remains short of the mark, and the human security profile of the region remains just modest. The region is comparatively underdeveloped and less prosperous. The emerging socio-political realities of Pakistan and awareness among the masses suggest that the region would receive an added attention during the years ahead. It is also deemed that the level of human security of GB – the role of geography as a foundational building block thereof – would directly influence the progress, development and security of Pakistan. Thus, the study is likely to remain relevant for many decades to come.

Objectives of the Study

- 1) *Viewing* the linkage of geography and human security, and its impact on socio-economic atmosphere of GB region so as to produce new knowledge for the disciplines of Peace and Conflict Studies (PCS), International Relations (IR), Security Studies, and other related faculties.

- 2) *Exploring* the role played by geography in human security of GB both as an impediment and expedient.
- 3) *Examining* the prospects for geography to be used as a driver for human and economic development in GB.
- 4) *Discussing* the hitherto un-discussed issue such as the nexus of geography, history, anthropology, economy and politics, and its impact on various issues in GB including the state of peace and conflict.
- 5) *Generating* a debate on the issue in academic, journalistic and policy circles.
- 6) *Proffering* relevant conclusions and practicable recommendations for national and regional leadership so as to alleviate human insecurities in the region.

Literature Review

Albeit abundant literature is available on the issues like geography, Gilgit-Baltistan and human security, the geography-human security relationship remains to be a gap particularly in case of the Gilgit-Baltistan region. Some of the relevant sources are being reviewed herein so as to carry out a meaningful study. Ten different kinds of work are available on GB that have been studied and reviewed herein. These include history of GB, Liberation War of GB in 1947-1948, state security narratives, fact books, travelogues, works on tourism, trekking and mountaineering, constitutional status, anthropology, geography and culture of GB. Both English and Urdu sources have been reviewed to make an argument on the basic academic supposition being followed in this thesis.

Baltistan in History by Banat Gul Afridi is one of the most reliable historical accounts of Baltistan.⁶ The author hailed from Darra Adam Khel of Federally Administered Tribal Area (FATA) of Pakistan and served as Assistant Political Agent of Baltistan in 1958 and Political Agent of Baltistan from 1964 to 1968. In between, he also served in Chilas. During his stay in Baltistan, he faced difficulty in finding information about the area. He could only get incomplete information which was haphazardly organized. In this context, he started gathering information from October 1966 and was able to write a comprehensive book on Baltistan from history through to the present. *Inter alia*, his book contains chapters on geography, religion, language, social customs, population revenue, education, forestry, health and tourism. This work

⁶ Banat Gul Afridi, *Baltistan in History* (Peshawar: Emjay Books International, 1988).

is no less than a reference book for perspective study on Baltistan, which can be inductively used for application to the entire GB region to some extent.

History of Northern Areas of Pakistan by Dr. Ahmad Hassan Dani is one of the most authentic and well researched books on the history of GB.⁷ *Inter alia*, it covers historical geography, geographical construct of GB and geographic features of various parts of the region and languages as a source of history. It also contains an ethnographic sketch, which includes environment and economy, sectarian landscape and socio-political systems. As far as history is concerned, it covers prehistory to history, early, medieval and modern history besides the Liberation War of 1947-1948. The book offers several lessons for the students of peace and conflict studies, and human security studies.

The Making of a Frontier by Algernon Durand is a valuable source for discussion on various issues in GB.⁸ Colonel Algernon Durand is a person who made history by virtue of playing an active role in the 19th century Great Game from the British side while he stayed in Gilgit Agency from 1889 to 1894 AD. He recorded history in the form of this book. He also served as a military secretary to the Viceroy of India from 1894 to 1899 AD. This book is based on his role and experience in the Gilgit Agency, especially his stay in Gilgit, Hunza, Nagar and even Chitral. Although this book relates to state security, it is indirectly relevant to human security too.

The Imperial Gazetteer of India is one of the authentic sources of information on all parts of the British Empire including GB.⁹ It contains accurate information on some aspects of GB and is of importance because of its official nature and comparative value. It also describes the role of local tribal chieftains and Dogra rulers besides characteristics of various tribes in the area.

Tareekh-e-Jammu (literally *the History of Jammu*) by Hashmatullah Khan is the most authentic original historical account of the State of Jammu and Kashmir (including GB) as it existed under the Dogra Regime.¹⁰ The author served as wazir-e-wazarat, equivalent to deputy commissioner, in Baltistan from 1909 to 1914. Ever

⁷ Dr Ahmad Hassan Dani, *History of Northern Areas of Pakistan up to 2000 A.D.* (Lahore: Sang-e-Meel Publication, 2001).

⁸ Algernon Durand, *The Making of a Frontier*, originally published by John Murray in London, 1899 (Rawalpindi: Army Education Press, 1971).

⁹ W. W. Hunter, *The Imperial Gazetteer of India*, Vol. 5 (London: Trubner and Co., 1885), 77-81.

¹⁰ Maulvi Hashmatullah Khan, *Tareekh-e-Jammu*, originally published in 1936 (Lahore: Maktaba e Ishaat e Adab, 1998).

since this work was published, it has been used as a reference book by researchers and scholars studying various aspects of Kashmir and GB.

Tareekh-e-Baltistan (literally *the History of Baltistan*), authored by Muhammad Yousaf Hussainabadi, is an authentic historical profile of Baltistan region of GB and also contains a lot of historical details about the entire GB region.¹¹ Actually, it is more than a simple narration of history; it gives lots of details about the geography of GB and human security conditions during various eras. Although, it does not deliberately describe or analyze the influence of geography on human security, yet its historical details leave a host of lessons and several conclusions relevant to the research at hand.

Tareekh-e-Gilgit (literally *the History of Gilgit*), authored by Dr Amar Singh Chohan, is a reliable source on the history of Gilgit Agency from 1877 to 1935.¹² Gilgit Agency was established by the British Indian Government in 1878, was abolished in 1881 and re-established in 1889. The British Empire acquired Gilgit Agency on lease for 60 years from the Kashmir State in 1935. Among these broad details, this book analyzes the Anglo-Russian contest in the frontier zones of GB in the nineteenth through the twentieth century. It is also an account of the imprints of the state security paradigm on human security in Gilgit Agency. It also describes economic, social and political activities of the contending empires besides the state of Kashmir in these areas. It shows that the shadows of state security existed not only on political security but also on other facets of human security.

Gilgit Baltistan aur Masla-e-Kashmir (literally *Gilgit-Baltistan and the Kashmir Issue*) written by Qasim Naseem, a senior journalist from Skardu throws light on the constitutional status of GB.¹³ It views the case in historical perspective, the constitutional journey of GB since 1947 and the prospective status. Analyzed in terms of political security subset of human security, it is a comprehensive account on the subject. Qasim Naseem, alongside most of other scholars in GB, opines that GB must become a province of Pakistan and that this had been decided by the people of

¹¹ Muhammad Yousaf Hussainabadi, *Tareekh-e-Baltistan* (Skardu: Baltistan Book Depot: 2006).

¹² Dr Amar Singh Chohan, *The Gilgit Agency 1877-1935*, trans. Dr Uzma Saleem and Sher Baz Ali Khan Bercha (Lahore: Jamhoori Publications, 2012). The book was originally published in English and was based on a pre-1947 era PhD dissertation by Dr Amar Singh Chohan from Jammu University.

¹³ Muhammad Qasim Naseem, *Gilgit Baltistan aur Masla-e-Kashmir* (Lahore: Sang e Meel Publications, 2007).

the region at the time of liberation from Dogra rule in 1947-1948. The central idea of this book can be determined by his assertion as follows:

The point to understand is that the Dogras entered Baltistan by means of military aggression. Other than that, there had neither been a constitutional or legal basis, legitimacy or rationale for their rule in GB, nor the people accepted their illegitimate rule. Hence, the Dogra occupation of the region following a military invasion cannot be a *raison d'être* for GB to be part of J&K. If GB can be declared a part of Kashmir, then both Pakistan and India could be declared a constitutional part of Britain. Kashmir itself has been ruled by Sultan Saeed Khan Kashgari and for a given period Afghans too. But it neither became of part of Kashgar nor an *atoot ang* (integral part) of Afghanistan. Likewise, we are not ready to accept Indian Occupied Kashmir (IOK) as part of India despite that it is under Indian administration since 1948.¹⁴

Qasim Naseem presents a comprehensive work apropos political security in GB; however, the Kashmiri leadership does not endorse this narrative. Hence, to analyze the issue correctly, the view from Kashmir has also been included in this thesis.

Juhd-e-Musalsil (literally *Continuous Struggle*) by Amanullah Khan is a political security narrative of a different kind on Kashmir.¹⁵ The author belonged to Astore district of GB, is the co-founder and chairman of the Jammu and Kashmir Liberation Front (JKLF) and believes in independence of the entire state of Jammu and Kashmir as it existed under the Dogra rule in 1947. This narrative is important in the overall discussion on political security in GB.

Gilgit-Baltistan ka Mustaqbil (literally *the Future of Gilgit-Baltistan*) by Amanullah Khan is yet another narrative on the political future of GB. In this case, the author views GB as part of Independent Kashmir as a result of a politico-constitutional struggle.¹⁶ This view is rooted in the recent history of GB wherein it was part of the Kashmir state under the Dogra rule from 1840 to 1948. It also embeds the role of geography in linkage between GB and Kashmir. The work under review not only gives justification for GB to be part of Kashmir but also its political and economic viability. This remains to be another important source to analyze the political security of GB.

¹⁴ Translated from Urdu by the author.

¹⁵ Amanullah Khan, *Juhd-e-Musalsil* (Rawalpindi: SSS Combined, 1992). Mr Amanullah Khan is Chairman Jammu and Kashmir Liberation Front (JKLF), a political party functioning on both sides of the Line of Control in Kashmir, struggling for independence of Kashmir (including GB).

¹⁶ Amanullah Khan, *Gilgit-Baltistan ka Mustaqbil* (Muzaffarabad: Jammu and Kashmir Liberation Front, 1995).

Geographic contiguity and erstwhile political singleness of GB and Kashmir keep both of them together in a number of intellectual and political debates. In many cases and by many scholars, their political fortune and future is seen as inseparable. Political security is a significant subset of human security and remains to be important in this thesis. Inter alia, *Azad Jammu and Kashmir and Gilgit-Baltistan* published by the Association for the Rights of the People of Jammu and Kashmir provides an interesting narrative on political security.¹⁷ It recommends various measures as to how the national and public interests can be aligned without hurting the cause of self-determination, yet giving complete fundamental rights to the people of Kashmir. It is important to note that this work, completed by some of the very renowned intellectuals and retired senior bureaucrats and ambassadors, considers the political security of GB and Azad Jammu & Kashmir alike, in other words GB as a part of Kashmir as against many within Gilgit-Baltistan who do not accede to this idea.

“A Socio-Political Study of Gilgit-Baltistan Province” by Omar Farooq Zain is a research work of great significance in the study of geo-humanity in GB.¹⁸ It contains concise but comprehensive details and discussion on geography, history, political dynamics, languages, customs, economy, strategic value and general conditions of masses. It also discusses the trade prospects of and through GB by means of expansion of communication infrastructure. In sum, it is one of the works in tune with geo-humanism in GB, though quite brief.

The Liberation War of 1947-1948 occupies a special place in the history of GB. The region was then part of the Jammu and Kashmir state under the Dogra rule. It is not only important to study the operations of war but the human security conditions under which the war was fought and the events resulting from the war including the political status of the region. A number of books have been written on the events of war both in English and Urdu. *The Kashmir Campaign* is one such authentic and detailed source.¹⁹ It provides full picture of the operations by military forces as well as irregular militias in all parts of Jammu and Kashmir covering

¹⁷ *Azad Jammu and Kashmir and Gilgit-Baltistan* (Muzaffarabad: The Association for the Rights of the People of Jammu and Kashmir, 2014).

¹⁸ Omar Farooq Zain, “A Socio-Political Study of Gilgit-Baltistan Province,” *Pakistan Journal of Social Sciences (PJSS)*, Vol. 30. No. 1 (September 2010): 181-190.

¹⁹ *The Kashmir Campaign* (Rawalpindi: Historical Section, General Headquarters, 1970).

complete 84,471 square miles. Most other works either discuss the operations in and along the GB front or in the Vale of Kashmir.

Shamsheer Say Zanjeer Tak (literally *From Sword to Chain*) by Colonel Mirza Hassan Khan contains a lot of details about the liberation war of GB in 1947-1948.²⁰ Actually, it is an autobiography of Colonel Mirza Hassan Khan, who himself participated in the war and led the force in a number of operations. Notwithstanding the informational value of the book, its veracity has been challenged by many other authors, participants of the liberation war and commoners in GB. It has been labelled ‘a self eulogizing account of history that uses condescending remarks for his companions and tries to pocket all the credit of the revolution for the author’.²¹ It is also important to mention that there is difference in the opinion of authors from Gilgit and those from Baltistan on who contributed how much – a case of ethnic polarization, albeit minor.

Gilgit Scouts by Mirzada Shah Khan is a rich historical account of the liberation war of GB in 1947-1948.²² Among other books on liberation war, this is a thorough work by an actual participant of war, Shah Khan, who later retired as a Group Captain from Pakistan Air Force in 1980. The book is important to study the human security conditions that led to the war in question.

Subh-e-Azadi-e-Baltistan (literally *Dawn of Freedom in Baltistan*) by Hashmatullah Khan is a detailed account of liberation war in Baltistan region of GB in 1948.²³ It is rich in information on the events of 1948. It also points to the human security conditions existing in Baltistan at that time, which led to the war. However, it has limited applicability to the thesis at hand.

Azadi-e-Gilgit-o-Baltistan (literally *Liberation of Gilgit-Baltistan*) by Ghulam Rasool is yet another thorough work on liberation war in GB in 1947-1948.²⁴ It also gives a good perspective on the constitutional and political status of the region from 1947 till date. However, it does not present full picture of human security in the area.

²⁰ Colonel Mirza Hassan Khan, *Shamsheer Say Zanjeer Tak*, 3rd edition (Rawalpindi: Northern Printing Press, 2010).

²¹ Noor, “Azadi Mubarak to Gilgit – Baltistan,” *Pamir Times*, October 29, 2008 <http://pamirtimes.net/2008/10/29/azadi-mubarak-to-gilgit-baltistan/> (accessed February 5, 2016) is one such example.

²² Mirzada Shah Khan, *Gilgit Scouts, Urdu* (Gilgit: Self Published, 1999).

²³ Hashmatullah Khan, *Subh-e-Azadi-e-Baltistan* (Lahore: Abdul Rafah Communications, 2003).

²⁴ Ghulam Rasool, *Azadi-e-Gilgit-o-Baltistan* (Rawalpindi: One International, 2004).

Remoteness and Modernity: Transformation and Continuity in Northern Pakistan by Dr Shafqat Hussain is a comprehensive anthropological inquiry into the idea of remote regions.²⁵ It is a sound application of the geographical concept of remote regions on GB with focus on the Hunza area. However, the conclusions of this work can be inductively applied from the Hunza district to the entire GB region. The geo-anthropological facts leave a lot of room for human security inferences and further academic investigation.

Aks-e-Gilgit-Baltistan (literally *the Reflection of Gilgit-Baltistan*) by Sher Baz Ali Khan Bercha is a good source of facts and figures about Gilgit-Baltistan, both geographical and anthropological.²⁶ It also gives comparative details on various aspects besides information on communication, energy, economy, health, education, literature, culture, religion, languages, politics and politico-administrative system in GB. Thus, even though it does not discuss the geo-humanistic issues, it is of great academic significance for correct analysis and workable conclusions in the course of research at hand.

A few Baltistan-exclusive works have appeared on the academic horizon with a lot of details and authenticity. *Mutalia-e-Baltistan* (literally *Baltistan Studies*) by Muhammad Nazir is one such book.²⁷ It contains details on history, geography, community makeup, administrative delineation of Baltistan into districts, subdivisions, tehsils, union councils and functioning of villages. The data is useful and generally shows the human security profile of the area.

Baltistan Tehzib-o-Saqafat (literally *the Culture in Baltistan*) by Muhammad Hassan Hasrat contains a lot of information with regard to geography, ethnicity, tribes, living styles, cultural customs and traditions, literature including poetry, local characteristics, sports, music, local health procedures, history and mythology of Baltistan.²⁸ The book does contain reference to the remaining parts of GB and even Kashmir. Without mentioning it as such, this work does offer conclusions on the

²⁵ Dr Shafqat Hussain, *Remoteness and Modernity: Transformation and Continuity in Northern Pakistan* (New Haven: Yale University Press, 2015). Dr Shafqat Hussain is assistant professor in Trinity College at Hartford, Connecticut, USA.

²⁶ Sher Baz Ali Khan Bercha, *Aks-e-Gilgit-Baltistan* (Gilgit: North Publications, 2013).

²⁷ Muhammad Nazir, *Mutalia-e-Baltistan* (Skardu: Shabbir Printing Press, 1996).

²⁸ Muhammad Hassan Hasrat, *Baltistan Tehzib-o-Saqafat*, 2nd edition (Skardu: Baltistan Book Depot, 2013). Muhammad Hassan Hasrat has been the regional director of Allama Iqbal Open University at Skardu. He has a keen eye on GB affairs and is author of a number of books that cover the history, geography and culture of Gilgit-Baltistan.

impact of geography on human security, the standards and way of living as well as human development.

Code of Tribal Custom in the Gilgit district, Jammu and Kashmir State by Sardar Thakur Singh is an invaluable work to study the socio-economic and human security conditions existing in Gilgit in early 20th century.²⁹ Sardar Thakur Singh was settlement officer of the Dogra Regime in Gilgit from 1918 to 1919. He compiled this work as part of the official record. Its cyclostyled print is still available in the Municipal Library Gilgit. It contains population data, sectarian profile and information on various customs and traditions of the people of Gilgit district.

Karakoram Highway (Vol I & II) by Muhammad Khalid Mumtaz contains details of construction of the Karakoram Highway (KKH), which is one of the highest paved roads in the world that crosses the Khunjab Pass (over 15,000 ft). It connects Pakistan with China, and is often referred to as the eighth wonder of the world.³⁰ KKH was constructed between 1959 and 1979 as a Pakistan-China joint venture, and hundreds of Pakistanis and Chinese laid down their lives in the process of constructing this highway piercing through the highest watersheds in the world. Eventually, KKH worked well to do away with the remoteness of the GB region by linking it both with Kashgar in China and Islamabad in Pakistan. As a result, it contributed towards improving the human security conditions in GB. These volumes not only provided the details of construction of KKH but also the geography in general and socio-economic conditions of GB before and after completion of KKH. It establishes that governance and technology are the best antidotes to ruggedness of geography for human development in general and improvement of human security profile of a region.

Pakistan & the Karakoram Highway published by Lonely Planet is primarily a country travel guide on Pakistan.³¹ However, *inter alia*, it is rich in information on geography and human conditions in GB. It can be gauged from the start of the chapters on GB in an expressive manner as:

²⁹ Sardar Thakur Singh, *Code of Tribal Custom in the Gilgit district, Jammu and Kashmir State*, originally published 1918-19, trans. Zafar Hayat Pal (Gilgit: North Publications, 2010). Sardar Thakur Singh was a settlement officer at Gilgit. He wrote the details of tribal customs, later published as a book.

³⁰ Muhammad Khalid Mumtaz, *Karakoram Highway, Vol I & II* (Rawalpindi: Hamza Pervez Printers, 2006).

³¹ Sarina Singh, et al., *Pakistan & the Karakoram Highway*, 7th edition (London: Lonely Planet, 2004).

Between Central Asia and the plains of Pakistan is a geographical vortex rich in history, cultural diversity and dramatic natural beauty. In this 'collision zone' of the Indian and Asian continents, the Pamir, Kunlun, Hindukush, Karakoram and Great Himalaya ranges are knotted together. Here the ground rises higher, over a greater area, than anywhere else on the planet, and China, Tajikistan, Afghanistan, Pakistan and India all come within 250km of each other.³²

In sum, this work is potentially a good secondary data source for drawing correct conclusions in this thesis.

The Indus River, flowing across the entire length of the country, provides for geographical definition of Pakistan. It has a number of names to include Indus, *Sindh*, *Sindhu*, *Neelab*, *Abaseen*, *Sing-e-Chhu* / *Sher Darya* / *the Lion River* and *Darya-e-Attock*. To understand the geography of Pakistan as well as the GB region, it is imperative to study various aspects of the Indus River. It originates from *Senge Khabab* (the Lion's Mouth) near Mount Kailash in Tibet (China), moves through the Ladakh region of Indian Occupied Kashmir (IOK), enters into Pakistan through Kharmang district of GB, moves through the Khyber-Pakhtunkhwa, the Punjab and Sindh before finally falling into the Indian Ocean. *Sher Darya* (literally *the Lion River*) by Raza Ali Abidi is a good description of the life of hundreds of millions of people dwelling on either side of this one of the longest rivers in Asia.³³

Because of the tourism, trekking, mountaineering and exploration value of the GB region, several travelogues have been published heretofore both by the Pakistani and foreign travel-writers. The first European explorers and travellers arrived in the Karakoram Mountains in 1830s, which kicked off the series of travel writings on Gilgit-Baltistan that took this region to the outside world through information domain. *The Apricot Road to Yarkand* by Salman Rashid is one such publication. This work is based on a historic journey by a group of three – Salman, Nasser and Naeem – who went through the Shigar and Braldu valleys to the West Muztagh Pass, a glaciated pass over which the people from Shigar (in Pakistan now) and Yarkand areas of Xinjiang (China) used to pass to visit each other for trade and other purposes. The groups came back and went to Xinjiang by road and trekked the West Muztagh Pass from the Chinese side over the Sarpo Laggo Glacier. This work is based on empirical observations and provides a lot of information both about geography and human security conditions in GB. It also makes a healthy critique on the exploration claims

³² Sarina Singh, et al., 249.

³³ Raza Ali Abidi, *Sher Darya* (Lahore, Sang e Meel Publications, 2012).

and credentials of the European explorers, writers, geographers and military officers. The book also shows the history of movement over high mountain passes between the adjoining regions besides demonstrating that many routes can be developed to link Pakistan and China through GB over various passes other than the Khunjrab Pass. It provides great insight into geo-humanistic matters of GB.

For a comprehensive case study on GB, it is imperative to study the geography and human security in its far-flung valleys. Ishkoman is one such valley located in the Ghizer district of GB. *Wadi-e-Ishkoman* (literally *the Ishkoman Valley*) by Muhammad Jan provides a lot of details on Ishkoman's history, geographic makeup and location, passes, territorial area and population, climate, tribes, cultural practices and folklores, languages, music, and the effect of geography on all facets of human life.³⁴ The information given in this work represents objectivism and its conclusions, being opinion-based, are a product of subjectivism. However, all these can be applied to the entire GB region to some extent using the inductive method.

Deosai by Mustansar Hussain Tararr is yet another travelogue, which, as the title suggests, mainly covers various aspects of Deosai, the second highest plateau in the world after the Tibetan Plateau.³⁵ It also contains information about *Chhota Deosai* (literally *the Small Deosai*), the areas on both ends of Deosai Plateaus e.g. Sadpara on the northern side (part of Skardu district) and Chilam on the southern fringes (part of Astore district). It also includes details of various aspects of human life on and around the Deosai Plains. Thus, it constitutes an important source on geo-humanistic plain in Gilgit-Baltistan even though it does not cover the topic comprehensively.

Deosai: Land of the Giants by Salman Rashid and Nadeem Khawar is yet another travelogue on the Deosai Plateau.³⁶ The authors had visited the plateau in 1990. It covers the geographical makeup of the plateau and the life over and around it. This includes human life as well as wild life i.e. flora and fauna. *Inter alia*, the fauna includes brown bear, ibex, snow leopard, wolf, fox, the Himalayan trout, golden marmot and hundreds of species of birds. The flora includes innumerable vascular plants and herbs, both medicinal and non-medicinal. The flora and fauna is inevitable

³⁴ Muhammad Jan, *Wadi-e-Ishkoman* (Gilgit: North Publications, 2012).

³⁵ Mustansir Hussain Tararr, *Deosai* (Lahore: Sang e Meel Publications, 2012).

³⁶ Salman Rashid and Nadeem Khawar, *Deosai: Land of the Giants* (Lahore: Sang e Meel Publications, 2013).

for ecology of the region. This work also includes information on nomadic life of *gujjars* (the cattle breeders) over the plateau during summer, the time wherein the entire Deosai Plateau becomes a colourful pasture. The plateau has abundant tourism value during summer. This work is an important source from the point of view of the human security of hundreds of thousands of people linked with this plateau and other similar areas in GB besides security of the endangered species such as brown bear etc.

Qadam Qadam Baltistan (literally *Baltistan: Step-by-Step*) authored by Engineer Wazir Qalbe Ali is a well researched piece of history. It does not cover all aspects of the history of Baltistan; however, it uncovers a number of hitherto hidden facets.³⁷ It also describes the condition of masses in Baltistan during various eras. Besides, it provides a comparative picture of Baltistan of the earlier times and that of today. The conclusions based on the facts given in this book can be inductively applied on the entire GB due to similarity of conditions.

Tribes of the Hindoo Koosh by John Biddulph is a 19th century book on the culture, languages and tribes of GB.³⁸ Even while the title suggests that it covers the Hindukush region alone i.e. Gilgit and Ghizer areas etc, actually it contains information about the entire GB i.e. the Pamir, Hindukush, Karakoram and Himalayan regions. It even discusses the area as far west as Chitral, Afghanistan and a portion of today's Tajikistan – the Oxus River Basin – and as far east as Ladakh. In other words, it covers the centre of the mountainous crescent formed by eight gigantic Asiatic watersheds to include Pamir, Hindukush, Karakoram, Himalayas, Kunlun, Tien Shan, Pishkom and Trans Alay. Without using the term as such, the book covers sufficient details of human security in the language of culture in various parts of GB and the adjoining regions, and is thus an important read with regard to this thesis.

Central Karakoram National Park: Natural Environment and Cultural Heritage in the Land of K2 by Invernizzi and Locatelli is a useful source insofar as an

³⁷ Engineer Wazir Qalbe Ali, *Qadam Qadam Baltistan* (Skardu: K-2 Group of Publications, 2002). The author had the honour to be the first engineer of Baltistan. He retired as Superintending Engineer from Northern Areas Public Works Department (NAPWD) now named Gilgit-Baltistan Public Works Department (GBPWD).

³⁸ John Biddulph, *Tribes of the Hindoo Koosh*, originally published in 1880 (Boston: Adamant Media Corporation, 2004). Major (later Colonel) John Biddulph was part of the British Army in 19th Century and appointed as political officer at Gilgit. He contributed in the great game of 19th Century on behalf of the British Empire, crossed into Kashgar from Gilgit side a number of times for coordination and improvement of relations with Yakub Beg, the Amir of Kashgar. He was instrumental in establishment of Gilgit agency in 1878 (abolished in 1881 after electoral defeat of Benjamin Disraeli, the British Prime Minister, in 1881).

understanding of physical and human geography in the Karakoram region of GB is concerned.³⁹ Central Karakoram National Park (CKNP) is the biggest protected area of Pakistan covering 10,000 square kilometres in the Central Karakoram mountain range, notable for its natural environment and cultural heritage. It covers five (out of total ten) districts of GB including Gilgit, Hunza, Nagar, Skardu and Ghanche.⁴⁰ By this yard, it covers half of GB and the data and conclusions of this book can be inductively used for application to the entire GB region. Actually, this work offers a lot of information that is pertinent to determine the effects of geography on human security in the region.

Travels in Kashmir: Ladak, Iskardo by G. T. Vigne contains historical chronicles of GB, Ladakh and Kashmir.⁴¹ Vigne visited the areas a number of times. He is the first known European to have visited Baltistan from 1835 to 1838 AD. He notes, 'I have, of course, embodied my travels in one continued narrative, without unnecessary reference to the number of times and variety of seasons I have visited the same places. I have, for instance, three times crossed the mountains from the Punjab to Iskardo [sic] in Little Tibet, and have necessarily passed through Kashmir on my way.' The book reveals the first known details of the area, both geographical and cultural, to the outside world. The earlier explorers and travellers like Vigne have provided incomparable information based on personal observations and are of great value for comparison in time i.e. past and present.

A Travel Companion to the Northern Areas of Pakistan by Tahir Jahangir is, as the title suggests, a handbook for travellers and tourists.⁴² It covers the entire northern Pakistan to include GB, Chitral and a part of Azad Kashmir. As a matter of fact, it is more than a mere travel guide. It proffers an understanding of the physical (and to a limited extent, human/ humanistic) geography of these areas on comparative basis. It serves as an important section in the chain of research on the issue at hand.

Trekking in the Karakoram & Hindukush by Mock and O'Neil is a book on trekking prospects and procedures in GB in particular Karakoram and Hindukush

³⁹ Ermes Invernizzi and Michele Locatelli, *Central Karakoram National Park: Natural Environment and Cultural Heritage in the Land of K2* (Islamabad: PIPS Pvt Ltd, 2015).

⁴⁰ Ibid, 5.

⁴¹ Godfrey Thomas Vigne (G. T. Vigne), *Travels in Kashmir: Ladak, Iskardo*, originally published in 1844 (Karachi: Indus Publications, 1987).

⁴² Tahir Jahangir, *A Travel Companion to the Northern Areas of Pakistan*, revised edition (Karachi: Oxford University Press, 2010).

region.⁴³ It also contains substantial information on history, geography, geology, climate, ecology, environment, flora and fauna, population, religion, society and languages in the region. It is useful for studying the case of geography and its impact on human security in GB.

Kashmir: Behind the Vale by M. J. Akbar puts various aspects of the Kashmir issue both in the perspective and prospective discussion.⁴⁴ It also takes GB into consideration as part of Kashmir dispute and is thus relevant insofar as the study of political security aspect of human security in GB is concerned.

GB is full of plants and herbs of medicinal value. All these add to the health security profile of the region. Whereas the local inhabitants do make some use of these plants in age-old rudimentary manner, limited research has been carried out on these plants by technical hands on scientific lines. *Medicinal Plants of the Northern Areas of Pakistan* by Ghulam Rasool is a work of vital importance to understand the value of such plants.⁴⁵ The author has been a career forester, served in the Forest Department of GB for decades besides serving as regional director of World Wildlife Fund (WWF). He closely observed the usage of various plant species. This work is based on his experiences, observations and research, and adds to the study of the health security subset of human security in GB. It is also relevant because of the fact that flora is a dividend of geography and its contribution towards human security falls in the realm of this thesis.

“Gilgit-Baltistan at a Glance 2013” published by Statistical Cell has a great deal of data and information about GB.⁴⁶ *Inter alia*, it contains data on population, economy, agriculture, administrative setups, health and education. This data is important to study the contextual makeup and human security basics of the region.

The human geography of a region manifests in its culture. The culture epitomizes human security to certain extent. *Cultural Encyclopaedia of Pakistan: Northern Areas, Karakoram, Himalayas, Hindukush* by four renowned scholars of

⁴³ John Mock and Kimberly O’Neil, *Trekking in the Karakoram & Hindukush* (London: Lonely Planet, 2nd edition, 2002).

⁴⁴ Mobashar Jawad (M.J) Akbar, *Kashmir: Behind the Vale* (New Delhi: Roli Books, 2002).

⁴⁵ Ghulam Rasool, *Medicinal Plants of the Northern Areas of Pakistan* (Gilgit, Self Publication, 1998).

⁴⁶ “Gilgit-Baltistan at a Glance 2013,” *Statistical Cell, Planning and Development Department*, Government of Gilgit-Baltistan (2013).

GB is an exhaustive research work on the subject.⁴⁷ It covers the entire GB region besides Chitral. In addition to culture, it also contains a lot of information about geography of the region. However, there are some factual errors in this volume which thus needs to be compared with other authentic works.

Human Security in Pakistan by Ehsan Mehmood Khan is both a conceptual work on human security and a case study of Pakistan.⁴⁸ It also contains a discussion on various aspects of human security in GB succinctly alongside remaining parts of Pakistan. Its conclusion can be amplified for application to GB on a broader spectrum.

Ladakh: The Trans-Himalayan Kingdom by Rajesh and Ramesh provides a good perspective on geography, environment, people and culture of Ladakh.⁴⁹ The work is important to draw comparison with GB as Ladakh is not only a neighbouring region but is also similar to GB in many respects.

Guardians of Glaciers published by Headquarters Force Command Northern Areas provides a good mix of information on geography, history, state security and to a small extent human security.⁵⁰ It primarily covers state security issues, particularly the Siachen dispute and military deployment along the Line of Control, which has its own kind of impact on human security in the region.

Siachen: Press Clippings by Haji Fida Muhammad Nashad is a compilation of various news reports and op-eds from renowned journalists and analysts that appeared in the print media on the issue of Siachen.⁵¹ It constitutes a good reference material in the context of research at hand in that the state security in GB has a definitive role to play in human security and both have a linkage with geography.

Dr Gottlieb Wilhelm Leitner, a 19th century traveller and author from Hungary, was conversant with some 50 languages, most of them Asian including Urdu. He visited a number of Muslim countries and regions in Asia including India. He became Principal of the Government College Lahore in 1864 and was also involved in

⁴⁷ Muhammad Hassan Hasrat, et al., *Cultural Encyclopaedia of Pakistan: Northern Areas, Karakoram, Himalayas and Hindukush* (Joint Publication by Islamabad: Lok Virsa Islamabad and Lahore: Al-Faisal Nashran, 2004).

⁴⁸ Ehsan Mehmood Khan, *Human Security in Pakistan* (Islamabad: Narratives, 2013).

⁴⁹ Rajesh Bedi and Ramesh Bedi, *Ladakh: The Trans-Himalayan Kingdom* (New Delhi: Roli Books, 1981).

⁵⁰ *Guardians of Glaciers* (Gilgit: Headquarters Force Command Northern Areas, 2012).

⁵¹ Haji Fida Muhammad Nashad, ed. *Siachen: Press Clippings* (Skardu: Soday Books, 2013). The author is Speaker Gilgit-Baltistan Legislative Assembly (GBLA).

establishment of the University of the Punjab. *Inter alia*, he wrote a book titled *History of Islam in Urdu*. His book *Dardistan in 1866, 1886 and 1893* is an account of history, religions, customs, legends, fables and songs of Gilgit Chilas, Kandia (Gabrial) Yasin, Chitral, Hunza, Nagyr [sic] and other parts of Karakoram and Hindukush.⁵² It offers a good perspective on human security conditions in the GB region in the 19th century, which provides a basis for comparison.

The language epitomizes culture and plays a great role in human security makeup of a region. GB is home to several languages and makes an apt ground for philological study. *Language Hunting in the Karakoram* by E. O. Lorimer provides some insights into the issue.⁵³ Emily Overend Lorimer (1881-1949) was a British linguist and political analyst. She stayed in Gilgit and Hunza areas in 1920-24 and 1934-1935 along with her husband Lieutenant Colonel D. L. R. Lorimer. This book is based on her experiences and observations.

GB is undergoing great transformation on one count: Education. People hailing even from the farthest valleys and communities are endeavouring to educate their children, both boys and girls. Education, on the other hand, is one of the most effective and long-term antidotes to human insecurities of various kinds for all geographical communities around the globe, and more so for remote regions like GB. It is contended that human security evolution in GB will come about by means of education. In fact, education is the fuel of human capital, which in turn is the foundation of economic capital in a region. Dr Benz offers a comprehensive perspective on education in GB discussing both opportunities and constraints especially for the rural households.⁵⁴ Dr Benz notes, “Formal education is often considered as one of the most important preconditions for development and one of its central driving forces.”⁵⁵

The Agha Khan Rural Support Programme (AKRSP) is considered to be a great private sector success story in the realm of human security in GB, and has no match so far. It is a branch of the Agha Khan Foundation and was established in 1982

⁵² Dr. Gottlieb Wilhelm Leitner, *Dardistan in 1866, 1886 and 1893*, originally published in 1889 (Karachi: Indus Publications, 1985).

⁵³ E. O. Lorimer, *Language Hunting in the Karakoram*, originally published in 1938 (Karachi: Indus Publications, 1989).

⁵⁴ Dr Andreas Benz, *Education for Development in Northern Pakistan: Opportunities and Constraints for Rural Households* (Karachi: Oxford University Press, 2014).

⁵⁵ *Ibid*, xxvii.

with the aim to improve the living standards and quality of life of the rural communities in GB and Chitral. The key areas of social intervention by AKRSP include social organization, women development, natural resource development, enterprise promotion, and credit and saving services.⁵⁶ Shoaib Sultan Khan, who had a long experience of working with the Agha Khan Foundation and AKRSP, has published a comprehensive work on the history and accomplishments of AKRSP.⁵⁷ It makes an important contribution towards understanding the socio-economic dynamics of GB and how the non-governmental sector can make a successful intervention to improve the human security conditions of a region made up of a rugged geography and living in remoteness since time immemorial.

The Gilgit-Baltistan (Empowerment & Self Governance) Order, 2009 is a sort of constitution underpinning the system of governance in GB.⁵⁸ It describes the fundamental rights and outlines the system of legislature, financial procedure, judicature, services and emergency provisions. In other words, it describes the official oversight of human security in GB. Since governance is an important interface between geography and security, this document is of vital importance to study the strengths and weaknesses of governance system in GB. It also manifests political security in the region.

Major Findings from Literature Review

The following major findings emerge from literature review:

- **First: availability of literature;** several works, books, papers and reports, are available both in published and unpublished form that cover various aspects of GB.
- **Second: still an unexplored region;** even while a lot has been written on GB, the region has not been fully explored yet because of several reasons including its remoteness and underdevelopment.
- **Third: the interest of the international community;** the international community has been interested in the geography rather than human security of the

⁵⁶ Humayun Khan, “NGOs and Gender Development, the Case of AKRSP in District Chitral, NWFP, Pakistan,” *The Lahore Journal of Economics*, 11:1 (Summer 2006): 81-98.

⁵⁷ Shoaib Sultan Khan, *The Agha Khan Rural Support Programme: A Journey through Grassroots Development* (Karachi: Oxford University Press, 2009).

⁵⁸ *The Gilgit-Baltistan (Empowerment & Self Governance) Order, 2009* (Gilgit: GBLA Secretariat, 2009).

area, and has been intervening in the form of the ancient silk route and the 19th century Great Game. It is now looking towards to completion of the China-Pakistan Economic Corridor (CPEC). Human security has not remained even a secondary consideration, although it has been affected by geography since the ancient era and continues to be so. The international academia has also been interested more in the geography and its impact on international relations: geopolitics, geo-strategy and geo-economics.

- **Fourth: human security – a distant dream;** human security remains a distant dream for the GB region. However, successful socio-economic intervention can be made both by the public and private sector; by the former in the form of improved governance and by latter in the form of community support. Successful models already exist such as that of AKRSP.
- **Fifth: the impact of geography on human security;** the GB region is known for its high mountain geography, which affects all aspects of life therein. People in GB are actually living by the way of geography. This denotes that geography is the bedrock of human security in GB and will continue to be so during the foreseeable future. Thus, to succeed, any public or private human security intervention must take geography into consideration. Likewise, GB's geography, especially its location dynamic, is important for development in the adjoining regions.
- **Sixth: geography and human security together;** several scholarly works on GB mention physical and human geography within the same manuscript. Many of the academic works on GB are a mix of history, geography, anthropology and political dynamics. Most of the works show that geography acts as the basis of all facets of human life including culture and economy.
- **Seventh: the Knowledge Gap;** the above notwithstanding, the study of relationship of geography and human security remains to be a void. The case of GB has not yet been studied for the role of geography in human security. No such logic has been evolved as yet. No book, paper or report has so far been prepared or published on this issue. Hence, it emerges as a gap in the existing knowledge on GB and thus needs a comprehensive academic inquiry.

Hypothesis and Variables

Based on the premise that *geography is a foundational dynamic that shapes the human security profile in a region*, the following hypothesis has been tested in this study with regard to Gilgit-Baltistan: *If geography is taken as the basis for development considering its role as an impediment and expedient, the human security situation in Gilgit-Baltistan can improve.*

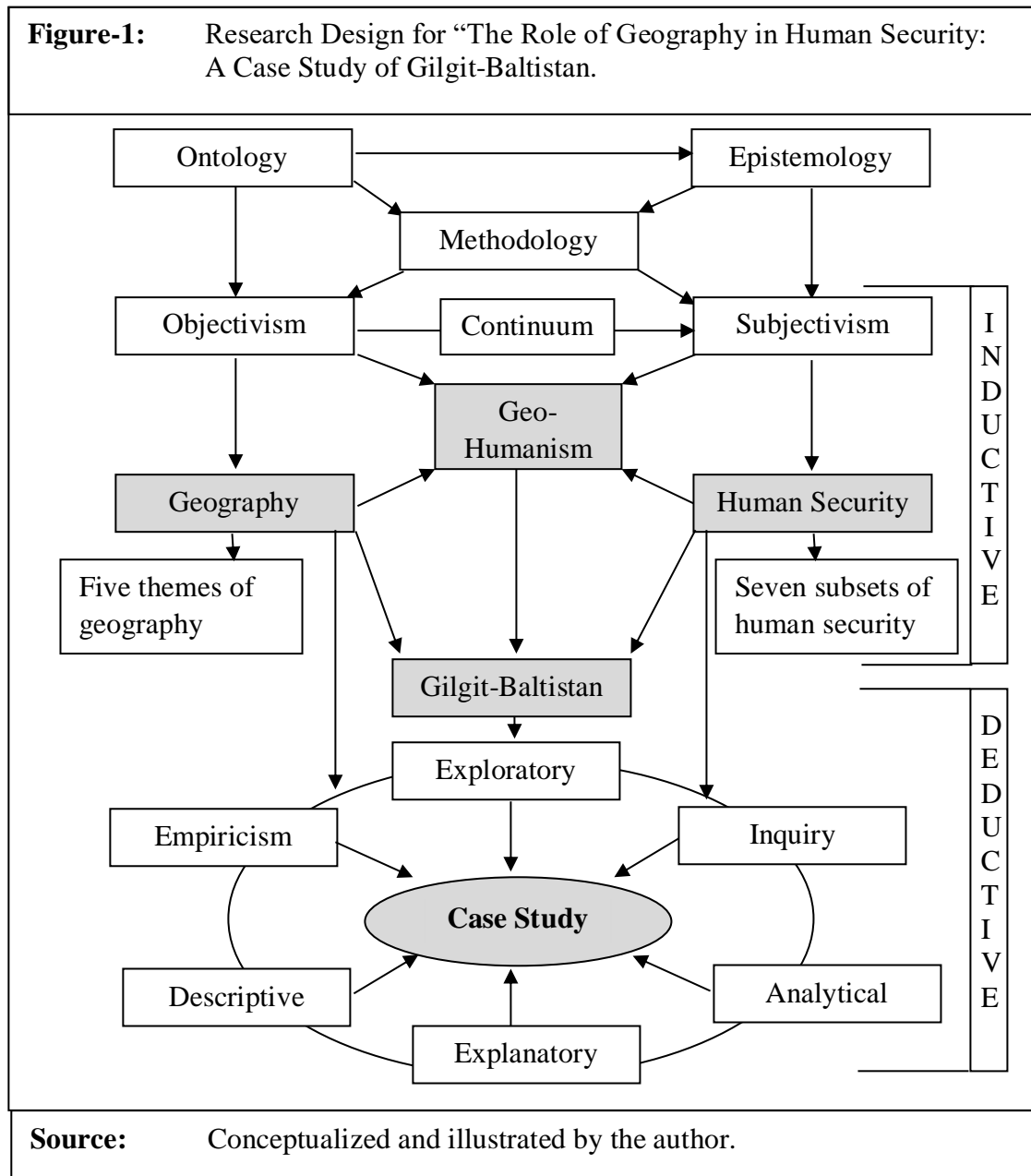
- **Independent Variable.** Geography.
- **Dependent Variable.** Human security.
- **Antecedent Variable**
 - Contextual makeup of the region.
 - Existing profile of human security.
 - Constitutional status of GB.
- **Intervening Variable**
 - Geo-strategic and geo-economic interests and pursuits of global powers.
 - Governance.
 - Technology.

Research Design

A multifaceted research design embracing succession and continuum between various facets and features has been devised for this research project. According to TerreBlanche and Durrheim (1999), the research process has three major dimensions: *ontology, epistemology and methodology*.⁵⁹

⁵⁹ Quoted in P. Y. Thomas, "Research Methodology and Design," *University of South Africa*, http://uir.unisa.ac.za/bitstream/handle/10500/4245/05Chap%204_Research%20methodology%20and%20design.pdf (accessed January 26, 2016).

As a matter of fact, inquiry-based knowledge is produced by the interplay of these three aspects. We can say that ontology is the hardware of research philosophy, epistemology is its software and methodology is its smartware. Methodology employs the attributes of ontology to produce an epistemological rejoinder to a given research problem. This research employs these three features of research philosophy as summit of the research design illustrated in Figure-1.



Grinnell and Williams explain it as ‘a plan used by the researcher to answer research questions’.⁶⁰ J. W. Creswell defines the research design as ‘the whole

⁶⁰ R. M. Grinnell and M. Williams, *Research in Social Work: A Primer* (Illinois: Peacock, 1990), 138.

process of conducting research from conceptualization to narration’⁶¹ According to TerreBlanche and Durrheim, ‘In developing a research design, the researcher must make a series of decisions along four dimensions: 1) the purpose of research; 2) the theoretical paradigm informing the research; 3) the context or situation within which the research is carried out; 4) the research techniques employed to collect and analyze data.’⁶² At any rate, a research design is the overarching research strategy, which follows the steps, practice and procedures necessary to investigate various facets in a manner that the research objectives are realized and hypothesis is proved or negated consistent with the strands of methodology adopted for the purpose. Consequently, this leads to the generation of an epistemological response within an ontological context. The research design for this dissertation has been made on the same lines.

Ontology

The term ‘ontology’, specifically *ontologia*, was coined by two German philosophers Rudolf Göckel and Jacob Lorhard independently in 1613.⁶³ It is a combination of two Greek words ‘*onto*’ meaning being and *logos* meaning science: the science or study of being. Bailey’s dictionary of 1721 defines ontology as ‘an Account of being in the Abstract’.⁶⁴ This manifestly means ‘theory of being’. Barry Smith notes that ‘Ontology as a branch of philosophy is the science of what is, of the kinds and structures of objects, properties, events, processes and relations in every area of reality’.⁶⁵ This certainly fits the research at hand the most as it involves geography which for the most part is a physical entity alongside human characteristics. All attributes of ontology i.e. being, becoming, reality, actuality and existence are found in the study of geography, and to an extent, human security as well. Rob Dekkers notes that ‘some philosophers, notably those of the Platonic school, argue that all nouns refer to entities. In that view, ontology covers objects as well as constructs of the mind and events’.⁶⁶ According to Howard Richards ‘other

⁶¹ J. W. Creswell, *Qualitative Inquiry and Research Design* (Thousand Oaks: SAGE, 1998), 2.

⁶² M. TerreBlanche and K. Durrheim, *Research in Practice: Applied Methods for the Social Sciences* (Cape Town: University of Cape Town Press, 1999), 33.

⁶³ Tony Lawson, “A Conception of Ontology,” *Cambridge Social Ontology Group*, http://www.csog.group.cam.ac.uk/A_Conception_of_Ontology.pdf (accessed January 29, 2016).

⁶⁴ *Ibid*, 33.

⁶⁵ Barry Smith, “Ontology,” in *Blackwell Guide to the Philosophy of Computing and Information*, ed. Luciano Floridi (Malden, Massachusetts: Blackwell Publishing Ltd, 2004), 155–166.

⁶⁶ Rob Dekkers, *Applied Systems Theory* (New York: Springer, 2015), 63.

schools contend that some nouns do not name entities but provide a shorthand way of referring to a collection of objects or events'.⁶⁷ For instance, geography denotes an assortment of physical features and human dynamics of our planet and its surroundings. Society refers to many people living together, and system refers to a set of various items, objects or things. All said, ontology remains the mother of all branches of learning as it offers basic constructs of items or entities, both physical and mental, across the range of sciences. The ontological properties of mind connect it with epistemology.

In case of this research work, geography embodies the ontology while human security mainly epitomizes epistemology. On ontological plane, structures, processes and dynamics of physical and human geography in a scientific form have been discussed and analyzed in this research work so as to create space for epistemological course to take place to gauge their effects on human security.

Epistemology

Epistemology or *Epistemologia* is a combination of two Greek words *episteme* i.e. knowledge and *logia* the study, theory or science: the theory of knowledge. According to Helen Buss Mitchell, epistemology is the 'branch of philosophy dealing with the study of knowledge, what it is and how we acquire it'.⁶⁸ Knowledge is regarded by many as 'belief'. To this end, Douglas J. Soccio, an accomplished philosopher, notes, 'Belief refers to the "subjective mental acceptance" that a claim is true. 'Knowledge' is 'justified true belief' – JTB (agreed by most philosophers).⁶⁹

Philosophy comes from a Greek word *philosophia*: *philia* (the love) and *sophia* (the wisdom).⁷⁰ However, the wisdom was taken over by knowledge through a process spanning centuries. There has been great debate on this issue. For instance, Douglas Soccio maintains that *Philosophy* in the archetypal sense is an activity as well as a fixed body of knowledge.⁷¹ James Frederick Ferries, who coined the term

⁶⁷ Howard Richards, *Understanding the Global Economy* (Thousand Oaks, CA: Peace Education Books, 2004), 348.

⁶⁸ Helen Buss Mitchell, *Roots of Wisdom: A Tapestry of Philosophical Traditions: A Tapestry of Philosophical Traditions* (Boston: Wadsworth, 2005), 24.

⁶⁹ Douglas J. Soccio, *Archetypes of Wisdom: An Introduction to Philosophy*, 8th ed. (Belmont: Wadsworth Publishing, 2012), 12-13.

⁷⁰ Antonio S. Cua, *Encyclopedia of Chinese Philosophy* (New York: Routledge, 2003), 499.

⁷¹ Soccio, 2012.

‘epistemology’, called it the ‘true beginning’ of philosophy.⁷² Contrarily, Will Durant strongly views that ‘Epistemology has kidnapped modern philosophy, and well nigh ruined it’.⁷³ He goes on to say that ‘analysis belongs to science, and gives us knowledge; philosophy must provide a synthesis for wisdom’.⁷⁴ Durant’s line of reasoning implies that the beginning of epistemology is the end of philosophy as against Ferrier’s assertion. Nonetheless, the debate has gone on for centuries and still continues.⁷⁵ Today, in the domain of social science research, epistemology has become synonymous with philosophy rather than being a part of the whole.

Epistemology is the nucleus of this research work as the purpose remains the generation of knowledge by filling the existing epistemic gap. The epistemological process herein has been drawn heavily from ontological realities. An endeavour has been made to discover the correct linkage between geography and human security through academic enquiry and epistemological investigation.

Research Methodology

For the most part, the qualitative method of research has been used in this study. Nevertheless, to draw the correct conclusions, the quantitative method has been made use of, primarily to supplement the qualitative method. Both primary and secondary methods have been used. However, considerable reliance has been made on the primary data in the form of interviews from relevant scholars, experts and professionals, politicians, officials and journalists from GB, officials, teachers and commoners, both from rural and urban settlements, and focus group discussions. An opinion survey, using a combination of cluster and random sampling techniques was carried out and remained helpful in supplementing the interviews. On the other hand, interviews helped in structuring the survey. The survey worked to produce a great deal of empirical and quantitative data. Ten clusters based on the 10 districts of GB were formed in order to seek opinion from all corners of GB. However, within each cluster, the random survey technique was adopted. Informal discussions were also held with people from both genders and various communities including some of the

⁷² Andreas Sofroniou, *Philosophy and Politics* (Raleigh, North Carolina: lulu.com, 2015), 33.

⁷³ Will Durant, *The Story of Philosophy* (New York: Washington Square Press, 1926), xxxiii.

⁷⁴ Durant, 1926.

⁷⁵ The issue has been briefly debated in Ehsan Mehmood Khan, “Philosophy and Social Science Research,” *ISSRA Papers 2013*, National Defence University Islamabad, Vol. VI, Issue II, (2013): 55-82.

remotest valleys of GB. They included scholars, journalists, politicians, government officials, university and college professors, teachers, farmers, traders, merchants, NGO officials, philanthropists, military persons, tourists, trekkers, mountaineers, tour operators, handicapped persons, the poor, orphans and widows, internally displaced persons (IDPs), students and sportsmen. Data collection from official sources was done through recurrent communication with officials at the level of GB and divisions, districts and subdivisions level.

Personal empirical observations of the author based on nearly a five years stay in GB and fifteen years of association with the region has been of great significance. In the course of research, I personally visited all ten districts of GB and most of the major valleys as follows: complete Skardu district including Gultari, Roundo valley, Kachura, Sukh nullah, Gamba area, main Skardu city, Sukemadan, Olding and Thorgo area; main Shigar valley i.e. complete Shigar district to include both east and west of Shigar River, Upper Braldu, Lower Braldu and Basha valleys; complete Kharmang district including area major towns and villages like Kharmang, Mehdiabad, Madhupur, Kamango, Tolti, Palpaldo, Olding, Ganokh, Hamzigund, Sinkhermo, Gidiasko and Mayordo; Hushe valley, Goma valley, Kundus valley, Keris valley, Thalay valley, Balghar valley, Shyok valley and Khaplu town of Ghanche district; Astore town, Bunji, Gurikot, Minimarg, Kamri and Rattu valley in Astore district; Gilgit city, Danyore, Nomal, Naltar valley, Jaglot and Bagrot valley in Gilgit district; Hunza, Aliabad, Rahimabad, Karimabad, Sost, Passu, Khunjrab Pass, Chipurson valley and Shimshal valley in Hunza district; Nagar proper, Hoper valley, Hispar valley and Chalt valley in Nagar district; and Yasin valley, Ishkoman valley, Karambar valley, Puniyal, Hatun, Gupis and Gahkuch towns, Phander valley and Shandur Pass (disputed between GB and KPK) in Ghizer district. I interacted with the people of all districts including the remotest valleys of GB, and from all socio-economic classes and both genders. Indeed, I visited the areas from Khunjrab Pass and East Muztagh Pass in the north, Shandur Pass in the West, Babusar Pass in the South and Chorbat Pass in the east.

I also crossed some of the high mountain passes. For instance, I crossed Shounter Pass in September 2015. It connects GB with AJ&K. I trekked from Rattu in Astore district and reached Kel in AJ&K. After two days, I came back taking the same route. I reached the base camps of some of the phenomenal peaks such as K-2 (8,611m) and Masherbrum (7,821m). I trekked over a number of glaciers including

Baltoro and its offshoot Braldu valley. Both combined, I visited 31 times from August 2014 to August 2016. For instance, from 18 to 30 June 2016, we (a group of six trekkers) foot-trekked some 225 kilometres (both ways) through Braldu valley / over Baltoro glacier. I sighted and snapped all five peaks above 8,000 metres located in GB, including K-2, Broad Peak, Gasherbrum I, Gasherbrum II and Nanga Parbat, some of them from more than one sides. I also sighted and snapped over two dozen peaks above 7,000 meters. I visited the renowned Deosai Plains, the second highest plateau in the world 30 times. I visited the agricultural fields, fruit orchards and animal pastures, and traversed all-weather roads, fair-weather tracks, foot-tracks and unbeaten tracks in the snowbound areas. I sighted and snapped wildlife a number of times e.g. markhor and snow leopard. After two years of thorough on-ground research, I felt like sitting over a mountain of primary knowledge, which together with secondary knowledge created a vivid image of the role of geography in human security of GB.

Insofar as the secondary resources are concerned, both published and unpublished material has been used. Official sources, where applicable and available have been used to authenticate the related data. All this combined to make the research process more pluralistic and diverse. The main components of the research methodology are discussed herein.

Objectivism, Subjectivism and Constructivism

Objectivism is one of the best philosophical approaches that can connect *ontology* with *epistemology* and has thus been employed as such as part of the research methodology in this work. The philosophy of objectivism, as against constructivism, believes that reality exists independent of mind and that it also includes objects irrespective of human perception or consciousness. In other words, objectivism is an ontological theory that embodies ‘objectivity’ of objects and their independence of human mind. Objectivism, according to Ayn Rand, the prime mover of the objectivist approach, is a philosophy for living on the earth, grounded in reality, and aimed at defining human nature and the nature of the world in which we live. However, reality can be known, understood and comprehended. In case of this research work, an objectivist approach suits the study of geography, its forms, structures, ideas and the human dynamics.

A response to reality comes in the form of metaphysical human ideas transformed into physical form – a work of art, a conscious emotional response.

Nevertheless, knowledge acquired through the process of cognition, consciousness and perception is essentially subjectivist. As a matter of fact, objectivism and subjectivism are not mutually exclusive. Subjective knowledge flows from objective realities. Both are interlinked. It is considered that subjectivist procedures complement the objectivist process. In this research work, interviews, discussions and survey were conducted as part of the subjectivist approach. In addition, objectivism and subjectivism combine to establish the constructivist argument. With regard to constructivism, Alexander Wendt notes, 'The structures of human association are determined primarily by shared ideas rather than material forces, and that the identities and interests of purposive actors are constructed by these shared ideas rather than given by nature'.⁷⁶ Wendt is partly right. He is suggesting a purely idealist approach. But, for correct conclusions, the structuralist approach cannot be completely sidelined. It has to be an apt synthesis between idealism and structuralism. To mention, Allama Dr Muhammad Iqbal, one of the most read philosophers of the Subcontinent, was also idealist. He had articulated:

جہاں تازہ کی افکار تازہ سے بے نمود کہ سنگ و خشت سے ہوتے نہیں جہاں پیدا

Translated as:

New worlds are founded on ideas, new and fertile
Worlds cannot be created with stone and soil

The synergy between objectivism, subjectivism and constructivism can work well to produce knowledge and add to human wisdom, something that is the prime objective of philosophy. But no single theory or philosophical approach can help in a multidisciplinary case study, which requires a synergy of philosophical approaches.

Two other approaches have applicability for this thesis: Structuralism and Functionalism. The structuralist approach considers that mental states or the elements of human culture are identified by what they are made of i.e. the structure of the system and its components and units. On the other hand, according to the functionalist approach, mental states are identified by what they do rather than by what they are made of. In functionalism, the emphasis is on the functions of various parts of units of a system rather than its structure or makeup. As a matter of fact, neither approach can

⁷⁶ Alexander Wendt, *Social Theory of International Politics* (Cambridge: Cambridge University Press, 1999), 1.

be wholly rejected. Thus, the geographical structure of GB and its structural constituents matter as do their functions.

The geography of Gilgit-Baltistan has been analyzed in the light of the five themes of geography adopted by the Association of American Geographers in 1984 including location, place, movement, human-environment interaction and region. Insofar as human security is concerned, it has been studied in the light of the United Nations Development Programme (UNDP)'s paradigm given in its Human Development Report – 1994 (HDR-1994). This includes seven subsets: economic security, food security, health security, environmental security, personal security, community security and political security.

Geo-humanism has been applied to Gilgit-Baltistan and analysis of the issue has been made in the form of a case study. According to Robert K. Yin, the case study research method is “an empirical inquiry that investigates a contemporary phenomenon within its real-life context; when the boundaries between phenomenon and context are not clearly evident; and in which multiple sources of evidence are used.”⁷⁷ According to Larry Christensen, Case study method uses of a descriptive research approach to obtain an in-depth analysis of a person, group, or phenomenon.⁷⁸ However, a combination of research techniques and methods including empiricism, experimental, inquiry, descriptive, explanatory and analytical approaches has been used in this case study, which is embedded in space (i.e. the GB region) rather than extended in time. The subject of the study is geo-humanism and object is the GB region. It is non-comparative study in essence. However, where necessary, comparison has been drawn between various subjects and objects of discussion to draw pertinent conclusions.

The end product of this academic inquiry remains to be the estimation of the influence of geography on human security in GB and the way it can be mitigated by extra-geographical alternatives such as governance and technology.

⁷⁷ Robert K. Yin, *Case study research: Design and methods* (Newbury Park, CA: Sage, 1984).

⁷⁸ Larry B. Christensen, *Experimental methodology*, 6th ed. (Simon & Schuster: Needham Heights, MA, 1994).

Organization of the Study

The study has been organized in the following manner:

- **Chapter-1: Introduction.** This part covers preliminary aspects to include the problem statement, significance and scope of the study, readership and target audiences, relevance and objectives of the study, literature review and major findings, the knowledge gap, hypotheses and variables, research design together with research methodology. This chapter provides a roadmap for the entire research process.
- **Chapter-2: Theoretical Framework: Geo-Humanism.** Being multidisciplinary in nature, this research is being conducted employing an assorted theoretical construct: Geo-Humanism. It is indeed a new approach to human security studies that tests the role of geography in human security, or in other words, the effect of geographic features on the human security profile of a region. It draws on both the constraining and facilitating attributes of geography with regard to human development, human security, state of peace and conflict, and international relations. The matrix of geo-humanism evolved as an outcome of analysis in this chapter includes discussion on man-man relationship, humanity-geography relationship and technology-geography relationship. Governance and technology have been found as working remedies to the constraints posed by geography on human security processes.
- **Chapter-3: Physical Geography of Gilgit-Baltistan.** It is imperative to first study the geographical composition of GB region in physical terms. The geography has been studied in the light of the five themes adopted by the Association of American Geographers in 1984. These themes include: location, place, human-environment interaction, movement and region.
- **Chapter-4: Human Geography and Contextual Makeup of Gilgit-Baltistan.** This chapter includes human geography, political, administrative, community, sectarian and ethno-linguistic structure of Gilgit-Baltistan in addition to historical perspective and discussion on the constitutional status of the region.
- **Chapter-5: Geo-Humanism in Gilgit-Baltistan.** This chapter is about the application of geo-humanism on the human security environment in GB. It investigates the current human security profile of GB as a region as well as

a collection of geographic communities, and views the effects of geography on all subsets of human security in GB considering its role as impediment and expedient. This chapter forms the nucleus of the thesis. The UNDP's human security paradigm given in the Human Development Report – 1997 (HDR-1997) provides the conceptual foundation for this chapter whereas the theory of geo-humanism is applied to view the effects of geography. HDR-1997 includes seven subsets of security as follows: political, economic, food, health, personal, community and environmental security.

- **Chapter-6: Public Opinion.** This chapter contains public opinion based on the survey carried out by the author especially to verify the key assumptions.
- **Chapter-7: Findings and Conclusions.** This chapter contains pertinent findings and conclusions drawn from the discussion made in previous chapters.
- **Chapter-8: Recommendations.** This chapter offers practicable recommendations to improve the human security situation in GB keeping in view the role of geography. The core theme of recommendations is: make the most of the strengths of geography, and mitigate the constraints posed by it.

Chapter-2

THEORETICAL FRAMEWORK: GEO-HUMANISM
Recognizing the Role of Geography in Human Security
 (A New Approach to Human Security Studies)

“There is nothing more practical than a good theory.”

– Kurt Lewin⁷⁹

Key words: Geography, human security, geo-humanism, geo-humanity, geo-humanistic

Scope: It is a multidisciplinary theoretic approach. The essence is human security, not geography, sociology or another subject.

Theories and Theorization

Theories are product of human experiences, empirical evidence and extended debates in social and intellectual circles. A theory is conceptualized to introduce natural or human phenomena. It may come to replace an existing theory or a time-honoured supposition. No single theory can explain a given trend comprehensively for an indefinite period. It is a mix of various theories that can help study a circumstance, event, trend or incidence. Likewise, no single theory of social science may be wholly right or completely wrong. All are based on various assumptions, postulates, threads and features. A proposition may be useful in one situation and not valid in another. Baylis, Smith and Owens noted, ‘A theory is not simply some grand formal model with hypotheses and assumptions. Rather, a theory is a kind of simplifying device that allows you to decide which facts matter and which do not’.⁸⁰ In certain cases, a theory also illustrates the interplay of various factors and relationship between different constituents of a phenomenon. In some cases, theories need to determine interplay between natural facts and social trends. Kenneth Waltz deems that ‘theories explain laws which identify invariant and probable associations’.⁸¹

According to Hollis and Smith, abstraction, generalization and connection are the prime outcomes of a theory. They note, ‘Theories perform three functions. They

⁷⁹ Kurt Lewin, *Field theory in social science: Selected theoretical papers* (London: Tavistock, 1952) 169.

⁸⁰ John Baylis, Steve Smith and Patricia Owens, ed., *The Globalization of World Politics: An Introduction to International Relations* (Oxford: Oxford University Press, 2013), 3.

⁸¹ Burchill 2001: 8 quoted in Oliver Daddow, *International Relations Theory* (London, SAGE, 2009), 31.

abstract (group together events, situations or objects which are not identical). They generalize (identify what these things which are not identical have in common by virtue of analysis of available facts). And they connect (identify cause and effect).⁸² Since most of the main theories were conceptualized in the Western world, many of them were based on the west-related issues and problems. In the age of globalization, the world is shrinking and the problems of the east and west are blending fast. However, many of the issues facing the individuals, households, communities and states in the third world are specific to themselves and endemic in nature. Thus, a workable theory must be context-specific, situation-specific and environment-specific.

The Need for a New Theoretical Construct

The need for human security is as old as is the human race itself. However, the concept of security has remained linked with the state for centuries. Human beings have rather been the basic securitization actor or unit. The demise of the Cold War shifted the intellectual discourse on security from state to individual and community as security referents. This was named human security. Dr Mahbub ul Haq, an accomplished economist from Pakistan who was an architect of the UN Human Development Report, had originally outlined and envisioned the human security concept and approach in 1972. He had asserted the necessity of incorporating the issues of governance and human rights abuse into development policies.⁸³ Development in different areas of the world needs different kinds of governance policies, priorities and resource allocation because of difference in the kind of human security challenges posed by various geographic environments. Thus, whereas human security response must come in the form of human development, the human security challenges need to be studied through the prism of geography. This would, in turn, alter the response too in line with the geographic imperatives.

Geography and Human Security

Geography and human security are two independent fields of study. Practically, both subjects have existed since the creation of the earth and the birth of the human race respectively. According to H.W. Odum, 'Man is the child of the earth.

⁸² Martin Hollis and Steve Smith, *Explaining and Understanding International Relations* (Broadbridge Mill, Wortley, UK: Clarendon Press, 1991), 62 quoted in Oliver Daddow.

⁸³ Dr Mahbub ul Haq "New Imperatives of Human Security: Barbara Ward Lecture 1972," *Development*, vol. 2 (1994): 40-43.

They cannot be separated'.⁸⁴ As an academic discipline, geography predates the Common Era; however, due to the primacy of security of state and other such umbrella entities, human security has remained neglected for centuries. The concept of human security appeared on the world academic horizon in the late twentieth century. It was discussed by different scholars and forums using different approaches in the twentieth century. However, the idea of human security was formally floated by Dr Mahbub ul Haq from the forum of the United Nations Development Programme (UNDP) in the Human Development Report (HDR)-1994.⁸⁵ Therefore, the concept of human security turned into a formal normative framework.

Human security lies at the intersection of social sciences such as economics, sociology, psychology, peace and conflict studies, strategic security studies, political science, international relations, education, anthropology, history and law. Moreover, it has a strong linkage with discipline of natural sciences like geography, physics, biology, chemistry and environmental studies. Yet, for the most part, human security has been studied in terms of human development. The threats to human security are primarily traced to the spheres of governance, internal conflicts, culture and development, and not geography and climate. Geography lies at the the crossroads of the domains of the natural and social sciences. Whereas physical geography is part of earth sciences within the natural science component of knowledge, human geography is a part of social sciences.

The humankind and the planetary objects have an innate and binding linkage. An extended debate has been made by geographers and social scientists to study geography for its interaction with the human race, i.e. man-earth relationship to an extent that human geography is one of the two main parts of the subject, the other being physical geography. A number of theories have heretofore been developed by various social scientists. While some of these theories were better received, the others could not make the desired mark. Likewise, different theories had different role, subject matters and focus areas. Environmental determinism and environmental

⁸⁴ Howard Washington Odum, *Understanding Society: The Principles of Dynamic Sociology* (Whitefish, MT: Literary Licensing, 2012), 87 quoted in Rajendra Kumar Sharma, *Fundamentals of Sociology* (Delhi: Atlantic Publishers, 2007), 104.

⁸⁵ Iztok Prezelj, "Challenges in Conceptualizing and Providing Human Security," *HUMSEC Journal*, Issue 2, (2008): 6. Dr Mahbub ul Haq had originally outlined and envisioned the human security concept and approach in his paper "New Imperatives of Human Security: Barbara Ward Lecture 1972," *Development*, vol. 2 (1994): 40-43. He had asserted the need to factor in the issues of governance and human rights abuse into development policies.

possibilism are two such theories, which content with each other to some a certain degree.⁸⁶ The determinists believe that man is completely under the influence of environment (including geography). Contrarily, possibilists argue that man is not entirely free from the influence of environment, but there is a room for endeavours *inter alia* in the form of technology, attitude, habits and human values, which influence man's action.⁸⁷ In other words, Environmental Possibilism is about how human beings can adapt to the difficulties and challenges caused by the environment. In fact, Environmental Determinism strayed into the realm of racism, and thus became controversial. Environmental Possibilism too became contentious because of similar streaks.

Human geography is also a similar concept. It is one of the two main branches of geography, the other being 'physical geography'. Human geography deals with the study of people and their communities, cultures, economies and interactions with the environment by studying their relations with and across space and place.⁸⁸ Another term 'humanistic geography' was popularized by Yi-Fu Tuan. The focus of humanistic geography is on people and their condition.⁸⁹ There is a clear difference between humanistic geography and geo-humanism. Humanistic geography encompasses geographical knowledge, territory and place, crowding and privacy, livelihood, religion and economics. On the other hand geo-humanism encompasses the interface of geography and human security keeping forth the UNDP's human security paradigm containing seven sub-sets as discussed in this script. A few more difference are highlighted in the table below:

| Humanistic Geography | Geo-Humanism |
|---|--|
| Primarily encompasses social conditions of people. | Takes a comprehensive view of virtually all human affairs in the realm of human security |
| Discusses the issue at philosophical plane with emphasis on awareness | Emphasis on structural and functional plane |

⁸⁶ To note, Ibn-e-Khaldun wrote a comprehensive book on world history and geography wherein he deliberated on the role of environment in human life. Thus, he is considered to be one of the earliest environmental determinists or possibilists. The intellectual legacy of the Muslim era remains pervasive.

⁸⁷ K. Fekadu, "The paradox in environmental determinism and possibilism: A literature review," *Journal of Geography and Regional Planning*, Department of Geography and Environmental Studies, Arba Mnich University, Ethiopia (August 2013): 132-139.

⁸⁸ Ron Johnston, "Human Geography" in Ron Johnston et al, *The Dictionary of Human Geography* (Oxford: Blackwell, 2000), 353-60 provides a detailed perspective.

⁸⁹ Yi-Fu Tuan, "Humanistic Geography," *Annals of the Association of American Geographers*, Vol. 66, No. 2 (June 1976): 266-276 contains a detailed view.

| | |
|--|---|
| Theoretical utility | Normative utility |
| An approach of intellectual inquiry | An approach of domestic governance and geo-politics in addition to scholarly expression |
| Inward looking (evolution from within) | Outward looking (development from external forces) |
| Role of geography <i>per se</i> | The role of other elements including governance approaches, usage of technology and international political interposition |

Another similar term is geohumanities. According to Douglas Richardson *et al* “the term geohumanities refers to the rapidly growing zone of creative interaction between geography and the humanities.”⁹⁰ In fact, geohumanities provides a transdisciplinary perspective on fusion of various disciplines of study of humanities with geography across the intellectual landscape.

The focus in this work has been made on the role of geography in human security. Geography is the bedrock over which the edifice of human society is built and the fabric of human security is textured. Geography acts both as an impediment and an expedient for human security, virtually in all regions of the world with all kinds of terrains including mountains, plains, forests, deserts, islands and coastal areas.

Certainly, the response to the challenges posed by geography has to be found from extra-geographical spheres, yet it is imperative to understand the nature and type of role that the geography plays in human security of a region in correct perspective. The existing literature is generally silent on it. Sporadic discussions do exist but no one has clearly discussed, studied or drawn an interface between geography and human security. Environmental determinism leaned towards racism. Environmental possibilism tried to bridge the vacuum by articulating the role of the environment in human culture but it was also made controversial. It points to a *knowledge gap* and thus the *need for a new theory* that can articulate the relationship of these two aspects i.e. *geography* and *human security*. It also needs a fresh look because the studies on man-man relations have undergone a sea change. Geography too, both in physical and human terms, has been transformed to a great extent. Yet, its foundations in physical terms have broadly remained unmoved and unchanged for a complete geological era.

⁹⁰ Michael Dear, *et al*, ed. *GeoHumanities: Art, History, Text at the Edge of Place* (New York: Routledge, 2011).

Technology has had its impact in altering the physical features corresponding to the needs of human existence. Yet, the role of geography in human security remains both fundamental and consequential. This chapter is an endeavour to develop a *new theory* to explain the geography-human security relationship. The theory has been termed *geo-humanism* with *geo-humanity* and *geo-humanistic* as its derivatives.

Basic Assumption

The theory of geo-humanism is based on the hypothesis that *geography is a foundational dynamic that shapes the human security profile in a region*. It may be considered by some as an effort towards *securitization* of geography or *geographization* of security, and would not be wide of the mark anyway. Geography has to be studied as a foundation of security to gauge its impact on human development. Likewise, security ought to be seen through the prism of geography so as to draw right conclusions based on correct inferences and suppositions. To do so, it is imperative to revisit the basics of geography and human security before we are able to build a case for geo-humanism.

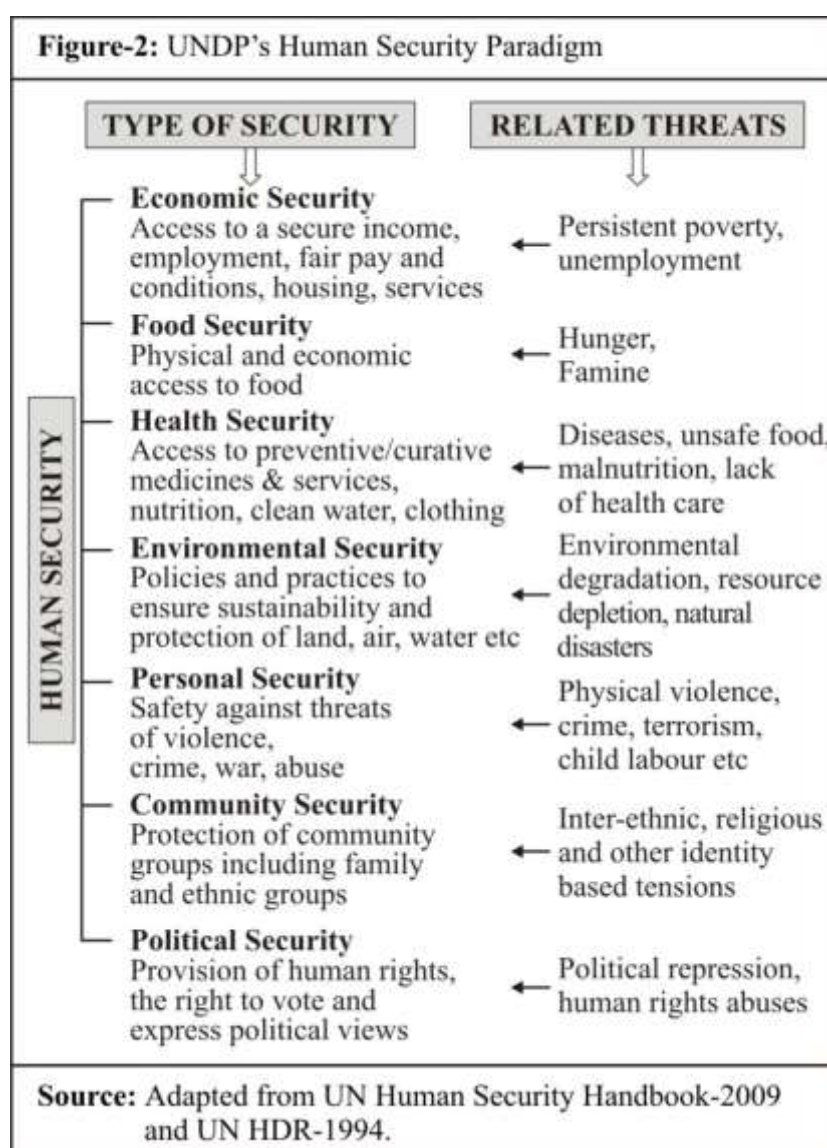
Human Security

Security has been discussed by social scientists and security experts in different ways and from different angles of the subject suiting their particular contexts and environment of the time. For the most part, it has been discussed in terms of the defence of states against external threats. To most of the scholars and policymakers, it remained a key component of the statecraft required to preserve sovereignty and statehood. The place of people and communities they hailed from did come under the debate, but the state maintained its primacy in thought and practice in the sphere of security since the Peace of Westphalia in 1648.⁹¹ Following World War II in 20th century, security was seen as an all-encompassing field of study. The policymakers and security experts started to view it in terms of individuals and communities alongside the states. However, due to the intricacies of the Cold War till 1989, the world principally remained hostage to the idea of state security based on the traditional model. The demise of the Cold War paved the way for the concept of human security to take a stronger root. The field of human security has changed the debate on subjects such as security, sovereignty, humanity *per se* and human rights.

⁹¹ Ehsan Mehmood Khan, 2013, 21.

A number of academics worked to expand the concept of human security both horizontally and vertically. It was also kindled by several humanitarian crises erupting in Africa, Asia, South America and even Europe. It worked to add the human dimension to security wherein the individuals and communities were seen as the security referents. Some scholars saw human security as parallel to the state security thus competing with the latter. However, in the final analysis, the concept of human security does not negate or repudiate the idea of state security. Each can and must complement the other. Human security and state security are two parts of the same whole called national security. Neither should have primacy over the other. Moreover, the state is the prime securitizing actor for both forms of security.

The HDR-1994 contains seven components or categories of human security including economic security, food security, health security, environmental security, personal security, community security and political security. This UNDP's paradigm of human security has been taken as basis for further discussion on the subject with



additions as and where found necessary. Figure-2 illustrates the seven subsets of human security along with the related threats as deemed by the UNDP.⁹²

Geography

‘What is geography?’ is a small and simple question but requires a lengthy explanation. The more we study the nature of geography, the tougher it becomes to define and describe it. The word geography was introduced or adopted in 200 BC by a Greek scholar Eratosthenes. It is a combination of two Greek words *geo* meaning ‘earth’ and *graphy* meaning ‘to write’ or ‘to describe’.⁹³ It involves both writing about (conveying, expressing or representing) the world and also writing (marking, shaping or transforming) the world.⁹⁴

Our earth is divided into various spheres such as atmosphere, hydrosphere, cryosphere, geosphere, biosphere and lithosphere. Geosphere is the hard surface of the earth and may be taken as the blanket term covering atmosphere, hydrosphere, cryosphere and lithosphere. On the other hand, biosphere includes all living organisms on the surface of earth.

The Earth System has two primary components: the geosphere and the biosphere. The geosphere has four subcomponents: lithosphere (solid Earth), atmosphere (gaseous envelope), hydrosphere (liquid water), and cryosphere (frozen water). Each of these subcomponents can be further subdivided into elements: for example, the oceans are an element of the hydrosphere. The biosphere (living organisms) contains about 100 phyla organized into five kingdoms of life forms. Human beings belong to the Kingdom Animalia and are but one species of the estimated 20 million to 100 million species in the biosphere.⁹⁵ In simple terms, the physical surface of the earth with human habitats over it has the seven main types as follows: mountains, plains, deserts, forests, coastal areas, polar region and maritime geography. All these regions have physical characteristics peculiar to themselves.

⁹² Adapted from *UN Human Security (HS) Handbook-2009*, op. cit. and “New Dimensions of Human Security,” UNDP HDR-1994, Chapter-2. Originally included in Ehsan Mehmood Khan, *Human Security in Pakistan*, 35.

⁹³ Paul Cloke, Philip Crang and Mark Goodwin, *Introducing Human Geographies, Third Edition* (New York: Routledge, 2013), xvi.

⁹⁴ Derek Gregory, et al., ed., *The Dictionary of Human Geography*, 5th edition (West Sussex, UK: Wiley-Blackwell, 2009), 287.

⁹⁵ Richard S. Williams, Jr, “The Earth System: The Earth’s Dynamic Cryosphere and the Earth System,” USGS, http://pubs.usgs.gov/pp/p1386a/pdf/notes/1-8hydrocycle_508.pdf (accessed May 21, 2016).

The two main branches of geography include physical geography and human geography. The latter is also known as cultural geography. Physical geography entails: physical science such as climate, landforms and soil, etc; biological science includes flora and fauna; and mathematical science includes earth's relationship with various celestial bodies, navigation and cartography, etc. Human geography, which is sometimes referred to as cultural geography, includes economic, political, social, environmental and historical aspects. Geography also includes the study of human-environment interaction, the properties of the earth's surface and characteristics of the human societies dwelling in different regions.

Dynamism of Geography

Geography, as a physical entity, is dynamic and it continues to change with time. The human geography is even more dynamic. The 18th century world map differed from that of the 19th century. World War I changed the world map once again. World War II was no different in this regard. The disintegration of the former Union of Soviet Socialist Republics (USSR) changed the world map yet again. Even between 1 January 2000 and 31 December 2015, three fully recognized states – East Timor, Montenegro and South Sudan – and three partially recognized states i.e. Kosovo, South Ossetia and Abkhazia emerged on the world map. Likewise, countless miles of tracks, roads, highways, railway lines, canals and other waterways are being constructed in the world annually. New villages and towns are emerging on the planet every year while the existing ones are expanding fast. Processes like afforestation and deforestation, mining and excavation, agricultural activities, erosion and loss of land to waterways and reclamation of land from the water bodies go on. These are a few examples of changes in geography that our planet continues to undergo. This exhibits the dynamism of geography.

Notwithstanding the aforementioned points, the foundations of geography remain unmoved and unchanged for millions of years. The Alps in Europe, the Himalayas in Asia, the Tibetan Plateau in China, the Deosai Plateau in Pakistan, the Black Forest in Germany, the Trincomalee Harbour of Sri Lanka, Caspian Sea in Central Asia, Sahara Desert in North Africa, the Spratly Islands in the South China Sea and Amazon River in South America have continued to exist on the planet earth immemorially. ***The life in deserts, mountains, plains, forests, the coastal areas and over the islands is different from each other. Basically, the human life in all these areas is actually shaped by the local geographic environment. This is geo-***

humanism. Geography is reflected through the dress, dietary habits, their means of conveyance and carriage, and their daily routine. Geography also affects the biological makeup of humans, animals and vegetation.

Effect of Geography on Internal Conflict

Clausewitz was an ‘Old War’ theorist. He served in the Rhine Campaigns (including the Siege of Mainz) from 1793 to 1794 AD as French revolutionary at the time of invasion of France by the Prussian army invaded during the French Revolution besides participating in the Napoleonic Wars from 1806 to 1815 AD. Influenced by the Napoleonic concept of *levée en masse*, he discussed the military aspects of irregular warfare in Book VI, Chapter XXVI titled ‘the People in Arms’.⁹⁶ Clausewitz lays down five conditions under which a general uprising can be effective. One of them is purely related to geography: The country must be rough and inaccessible, because of mountains or forests, marshes, or the local methods of cultivation.⁹⁷ Certainly, geography has a fundamental role to play in warfare, and has been doing so throughout the history of mankind. This makes a direct linkage with human security. Another condition stipulated by Clausewitz is: The national character must be suited to that type of war. The history of warfare corroborates the notion that geography plays a great role in forming the national character. The Afghans have been fighting in the rugged mountains of Hindukush, Pamir, Koh-i-Baba, Koh-i-Suleman and Koh-e-Safaid for centuries against each other as well as the foreign invaders. The physical and human geography worked to build their character as warriors. This is not to say that that people from all mountainous regions have a combative character. While physical geography builds them into strongmen, human geography may not support a martial character.

Impact of the Type of Geography

People of the plains have not been as tough as those from mountains and deserts. Due to fertile lands, they had easy access to food grain, which contributed greatly towards their economy. In general, they have not been the conquerors. There are hardly a few examples wherein the people from lower elevations invaded the

⁹⁶ Ehsan Mehmood Khan, “A Strategic Perspective on Taliban Warfare,” *Small Wars Journal* (2010): 3-4.

⁹⁷ Carl von Clausewitz, *On War*, trans. Michael Howard and Peter Paret (Princeton, NJ: Princeton University Press, 1976), 479.

highlands in any part of the world. Conversely, the people from mountainous regions invaded the non-mountainous regions repeatedly through the history of mankind. For instance, the South Asian Subcontinent was invaded a number of times, *inter alia*, by Aryans, Greek, Arabs, Afghans, Mughals and the British. The invasion took place in a west-east or north-south direction. Hardly a couple of unsuccessful east-west invasion attempts can be cited e.g. the Anglo-Afghan wars of the nineteenth and twentieth century. Besides, the people from the plains rarely migrated in search for food or wealth. Generally, they remained tied to their lands. Mountains are home to very strong human societies even though the concept of civic life has a different meaning therein. Mirza Ali, a famous mountaineer from GB, says ‘I do not agree when people term civilization for living in the cities. I think civilization is right out in the mountains, where it is found in the form of pure nature. Cities are just a jungle of interests and greed’.⁹⁸

Geography as a Basis for Superiority or Inferiority

Ethno-geographic and racial characteristics have sometimes in the history been used to demonstrate the superiority of one race over the others. For instance, the concept of ‘the white man’s burden’ based on Rudyard Kipling’s 1899 poem was used to conjure up the civilizational superiority of the white man over the other races on the planet.⁹⁹ In 1930s, Hitler spread the concept of racial purity and the image of superiority of the German race over the others: the master race. However, the events of history have proved all this wrong. Various races have seen ups and downs in the course of history. Actually, physical geography contributes towards the growth of human geography. Both these join to build the human security profile of a region. A group of people or ethnicity with a better human security profile is bound to move better on the road to progression in comparison to the ethnicities with a low level of human development. They fare well in all human spheres. However, it does not

⁹⁸ Mirza Ali, famous mountaineer from Hunza, Interview by author, Hunza (via WhatsApp), March 28 2016. He is the Founding President of Pakistan Youth Outreach and Founder and CEO of Karakoram Expeditions

⁹⁹ Joseph Rudyard Kipling was born on December 30, 1865, in Bombay, India. He was educated in England but returned to India in 1882. “Rudyard Kipling: Writer, 1865-1936,” <http://www.biography.com/people/rudyard-kipling-9365581> (accessed March 13, 2016). Kipling glorified the British Empire and its officials in his writings. He even exalted Brigadier-General Reginald Edward Harry Dyer as “the man who saved India” even though he is still known in India and Pakistan as the “Butcher of Amritsar” for having used force against unarmed civilians in Jallianwala Bagh Massacre on April 13, 1919.

remain a permanent feature. The profile may change and thus their standing vis-à-vis each other.

The baton of power has been changing between the people from mountains, plains, forests, deserts, islands and coastal areas in different times in different areas over the planet. Similarly, the level of human development has also been shifting between the people from various geographic regions on the globe. Geography is not and cannot be a basis of the qualities of head and heart of the inhabitants. It has been observed that every geographic region on earth is producing scientists, scholars, doctors, engineers, educationists and soldiers. Each geographic region is producing highly intelligent and immensely brave people. Simply put, geography cannot serve as a driver for the superiority or inferiority of a racial group. The theory of geo-humanism views geography only in terms of its impact on human security.

Concepts like Manifest Destiny or Environmental Determination are certainly controversial and challengeable; however, there are certain inevitable and predestined consequences of geography one belongs to. For instance, if the graves in the state of Louisiana in the US are raised above the ground due to the very high water table, it is consequence of geography. Likewise, if the city of Murmansk in Russia remains without sunlight for several months and its inhabitants suffer from the psychological ailment called Polar Night Stress, it is a product of geography. Similarly, Indian Army soldiers undergo the physio-psychological illness called the Siachen Syndrome over the Siachen glacier; it is an outcome of geography. In the same way, the secessionist movement in the province of Québec in Canada has a strong linkage with human geography. Chile produces some 20 percent of the world's copper annually and has approximately one-fourth of the world's copper reserves; it is a geographic dividend that stimulates the processes of human security. Brazil is the world's leading coffee producer; it is a geographic gain. The development of antiplanos by the Inca civilization over the Andes Mountains and construction of Machu Picchu city during the 15th and 16th centuries was facilitated by geography. Geography has been instrumental in shaping the culture of human civilization. The differences in geography produce differences in cultures.

Cultural Evolution

A geographic region absorbs various cultural influences from their adjoining regions. The aliens and foreigners visit a region in various forms. War and trade have been the major factors that kindled progress in other regions. However, it has been

observed that whereas armies after armies marched into the plains and deserts time and again, such events in the mountainous areas occurred less frequently. Most of the invading powers regarded the forays into the mountains as too costly. Thus, the process of cultural evolution of the mountainous regions remained historically slow.

The Less Governed Spaces

Because of geographic remoteness, these areas are underprivileged due to less a lower level of state presence. The concept of *ungoverned spaces* is partly applicable to these areas. They can rather be called the *less governed* spaces. These areas are deficient in terms of basic provisions and facilities including health, education, communication means and other services. They lack job opportunities. Many of them are still living closer to Thomas Hobbes' supposed state of nature. The people of Chipurson valley of Hunza and Karambar valley of Ghizer district are still engaged in barter trade with the people from Wakhan Corridor of Afghanistan and the Wakhi region of Central Asia. The state borders do not obstruct their movement or activities. These areas lack schools and other such facilities to an alarming extent. They need to send their children to the schools in adjoining towns, district headquarters and even to other provinces.

Geography influences the human social system. The civic life both in the rural and urban settlements in non-mountainous areas is hard to realize in mountains, especially in the developing countries. Population density is thin in the mountainous regions of Pamir, Himalayas, Karakoram, Hindukush, Kunlun, Piskhom, Trans Alay, Hindukush and Tien Shan etc.¹⁰⁰ The populace is spread across this mountain mass on our planet in small groups and dwells in valleys that can sustain human life with a bare minimum of geographic essentials. Due to the modest governance capacity of the countries inhabiting these watersheds, there is a governance gap in these regions. Some of the areas practically fall into the category of "ungoverned spaces." The term is already contested and controversial. However, we may consider some of the areas as "less governed spaces." To this end, Dr Shafqat Hussain notes that the authority of the state remains in many ways incomplete and tenuous.¹⁰¹

¹⁰⁰ The Himalayas began forming when India collided with Asia about 40 to 50 million years ago (some accounts note it as 55 million years ago). Other mountain systems also formed as a result of collisions between two continental plates. *Inter alia*, Reed Wicander and James S. Monroe, *Essentials of Physical Geology* (Boston, Massachusetts: Brooks Cole, 2008), 261.

¹⁰¹ Dr Shafqat Hussain, *Remoteness and Modernity: Transformation and Continuity in Northern Pakistan*, 2.

The Cost of Human Security in Mountainous Regions

Mountain communities tend strongly to develop and defend a distinctive cultural identity.¹⁰² This is more or less true for mountainous areas throughout the world. The communities are sparsely located. Interdependence of the people in socio-cultural, economic and security spheres make the communities inherently strong. Some 22 percent of the people of the world live in mountain regions. Lowland people are dependent on the mountain environment for a wide range of goods and services, including water, energy, timber, biodiversity maintenance, and opportunities for recreation and spiritual renewal.¹⁰³ According to His Highness Prince Karim Agha Khan, ‘Mountains have more cultural diversity than any other physical setting. This is a great source of strength and an asset and should be supported as such.’¹⁰⁴

Not all mountain regions are underdeveloped. For example, the Alps and other high mountain territories in Europe and North America have a better state of human security compared with those in Asia. However, even in Euro-American regions, the cost of human security is much more than that in plains and deserts on these continents. Developing nations cannot afford the cost. Therefore, the impact of geography is more than on the developed countries. Due to the treacherous terrain, it is also time consuming in mountainous regions. This aspect, too, increases the cost.

Effects of Geography on Religion

Geography also influences the religion of people hailing from various geographic areas feel affection for the features of their surroundings. The concept of sacred geography and sacred mountains is a living example. Agrarian spiritualism is another example wherein the people fall in love with vegetation. The foliage starts playing a role in their religious beliefs. Actually, it is a two-way process. Geographical ideas are affected by religion and religious beliefs are affected by geography. For instance, Biblical Geography was developed in the 16th century to recognize places from the Holy Bible.¹⁰⁵ Likewise, the Holy Quran has a lot of information about geography, cosmology and astronomy. From 16th century onward, the study of

¹⁰² Simon Blyth, et al., *Mountain Watch: Environmental Change & Sustainable Developmental in Mountains* (Cambridge: UNEP World Conservation Monitoring Centre, 2002), 20.

¹⁰³ Ibid, 8.

¹⁰⁴ His Highness Prince Karim Agha Khan, address at Bishkek Global Mountain Summit Kyrgyz Republic, October 31, 2002.

¹⁰⁵ Lily Kong, “Geography and Religion: Trends and Prospects,” *Progress in Human Geography* 14 (3), (1990): 355-371.

geography was linked with the spread of Christianity in the world. Later, the term ecclesiastical geography was popularized in 20th century to denote this phenomenon. Religion, indeed, believes in geography as a divinely inspired/constructed entity and the geo-religious studies and approaches aim at finding linkage between nature and religion. Certainly, there is a concrete connection. Moreover, both geography and religion attempt to shape the culture, economy and political system of a given region. This creates human security imperatives of the area. Thus, human security becomes the connecting section in the chain of relationship between geography and religion.

It is not only the structural frame of geography but also the location and influences drawn from the adjoining regions that matter. Geography influences political ideals and political systems, too. People are actually attached to the geography for everything. ***They are living by the way of geography. This is geo-humanism.***

People Live by the Way of Geography

One of my colleagues hailing from Lahore, a large city located in the heart of the plains of the Punjab (the provincial capital) in Pakistan, visited Gwadar, a coastal town in the province of Balochistan. A native from Gwadar asked him, ‘Where do you come from?’ My colleague replied, “Lahore.” The native asked, “Does Lahore have a sea [is it located near a sea]?” He replied, “No.” The native exclaimed, “What do you eat then?” Nothing was wrong with the person from Gwadar. He actually could not imagine that someone can live without seafood. Similarly, a person from the Himalayan region of Pakistan who had never visited the plains in his life once asked a colleague: Do the plains of Punjab have a mountain? The colleague replied, “No.” The man from the Himalayas asked, “Where does the sun set then?” These two instances corroborate the notion that the geography of a given area not only plays a role in the life style of its inhabitants but also their approach towards life and even the perspective and outlook of life.

Geography – an Impediment as well as Expedient

Human life takes its course in a given geographical space. Thus, human security develops a great dependence on geography and its various attributes. Geography is both an impediment and an expedient for human security. In some of the human security spheres, geography impedes human progress while there are others wherein geography acts as a means to its realization. Rajendra Kumar Sharma notes, ‘All the various kinds of environment... influence and affect man. A comparative study of the life in plains, desert, and the Polar Regions will clearly

sketch the influence of the environment. The super-social environment of man is instrumental in forming and shaping his conception of God, religion and morality.’¹⁰⁶ He gives four kinds of environment: Physical environment, which includes geographical, climatic and controlled geographical environment; Biological environment, which includes plants and animals; Social environment, which includes economic, cultural and psycho social environment; and Super-social environment, which includes conceptions and commonly accepted notions concerning God or a supernatural existence.¹⁰⁷ William W. Kellogg deems that ‘man can influence the planet’s environment on a grand scale. Though he may have influenced climate already ... he may be able to do it in a *larger way*’.¹⁰⁸ How much a natural environment remains natural after human activities depends on the quantum of human intervention. It is also of note that there is no standalone geographic feature on our planet; all natural and man-made features are interlinked. The man-made features are built to enhance connectivity and linkages between the natural geographic features for the purpose of human security. It is like value addition in a raw substance. Thus, the man-made features are an important aspect of geo-humanism.

The Matrix of Geo-Humanism

In the determinism-possibilism debate, the environmental determinists believe that man is completely under the influence of nature while the possibilists deem that alongside the environment there are other factors that affect man’s action and behaviour. Here, we will not enter this long and inconclusive debate. Let us once and for all establish that without doubt geography influences man, and likewise, man influences geography. True to what Howard Odum said, ‘Man is child of the earth. They cannot be separated’.¹⁰⁹ E.C. Relph noted that, ‘the landscapes and places we live in are important. Whether we shape them or they shape us, they are the expressions of what we are. Our lives are impoverished precisely to the extent that we ignore them.’¹¹⁰ The context herein is purely human security. The core argument is

¹⁰⁶ Sharma, 103.

¹⁰⁷ Ibid.

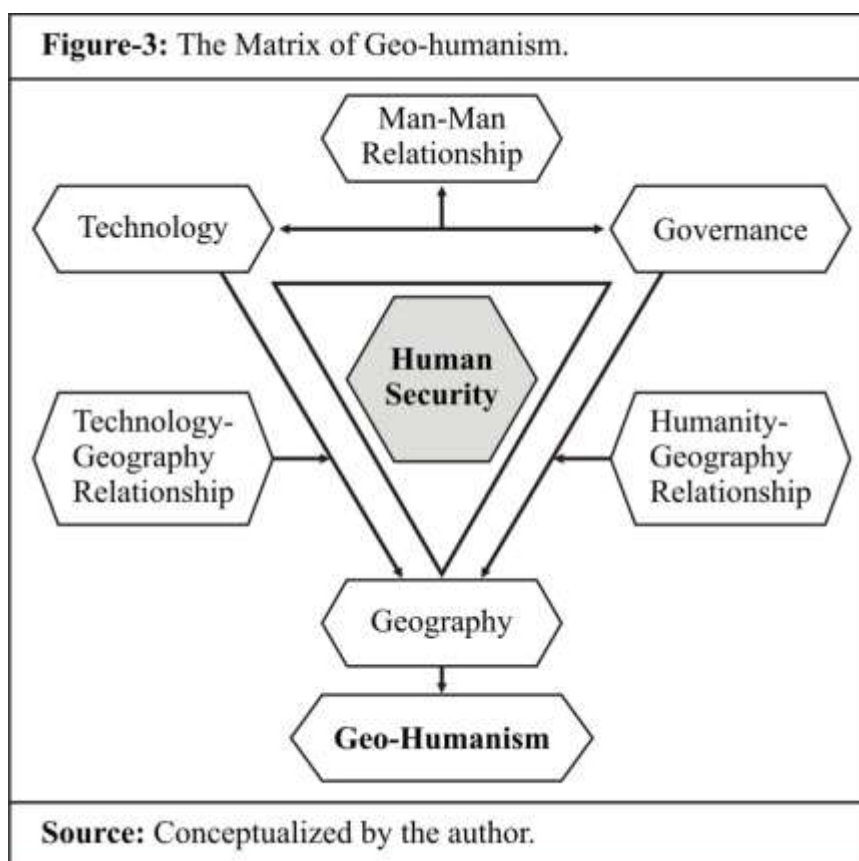
¹⁰⁸ William W. Kellogg, “Climate Change and the Influence of Man’s Activities on the Global Environment,” in *The Changing Global Environment*, ed. S. Fred Singer (New York: Springer, 1975), 13.

¹⁰⁹ Howard Washington Odum quoted in Rajendra Kumar Sharma, 104.

¹¹⁰ E. C. Relph, *The Modern Urban Landscape: 1880 to the Present* (Baltimore, MD: Johns Hopkins University Press), 291.

that the nature-man relationship drives the human security profile while man-man relations and man-nature linkage enable further advancement. We need to study and determine as to how this two-way influence works to shape the human security environment, and, in particular, how geography acts to shape the human security profile of a region.

Whereas geography influences the course of human security, the human security requirements play their part in the transformation of geography by the way of governance and application of technology. Thus, it is a two-way movement. Both facets continue to reflect on each other and thus continue to evolve. Governance and technology are in fact the antidotes to various human security threats posed by geography, some of which may be existential in nature. We can conclude that geography is the *primary driver* of human security while technology and governance act as the *core enablers*. Geography is the foundational bedrock that sustains and shapes the human security profile of a region. The accomplishments of governance and effects of technological development are proportional to the type of geography. Both these enablers interact with the primary driver to mitigate the human security challenges consistent with the geographic influences. In fact, the application of technology takes place through governance. We may say that governance is the software while technology is the hardware of geo-humanism. This manifests the process and function of geo-humanism. We can also call it Geography-Technology-Governance process or in short form GTG process as Figure-3 illustrates. It exemplifies three connections i.e. the relationship between humanity and geography, that between technology and geography and that between man and man.



Let us discuss the seven subsets of human security in the light of geo-humanism. Political security implies the security of individuals, communities in a given region or state in political and constitutional terms. The UN description of political security is linked with human rights and is too broad: ‘People should be able to live in a society that honours their basic human rights.’¹¹¹ The main threats to political security identified are political repression and human rights abuses.¹¹² Certainly, the political system and constitutional status of a region affects the state of human rights.

Geography and politics have an age-old relationship. Political processes are heavily influenced by the type of geography as well as the geographic location. The makeup of the international political system and its constituent units such as states are an outcome of geographic interface. The boundaries of states and other political entities are influenced significantly by geography. The erstwhile colonial and imperial powers pursued their expansionist designs on the chessboard of geography.

¹¹¹ “New Dimensions of Human Security,” 32.

¹¹² *UN Human Security (HS) Handbook-2009: Human security in theory and practice*, UN Trust for Human Security, http://hdr.undp.org/en/media/HS_Handbook_2009.pdf (accessed January 12, 2013): 7.

States are permanently engaged in trying to survive by defending their geography and geographic resources. Thus, geography acts as the bedrock of global political progression. The issue has been debated at length by political scientists and falls into the realm of geopolitics as well as political geography.

As a matter of fact, the course of politics unfolds in a given geographic area and is shaped by the territorial size and spatial configuration. For example, communization of various parts of the world in the 20th century followed a geographic pattern both in terms of physical and human geography. Geography was embedded in the domino theory too wherein the spread of communism was feared to follow the location dynamic of geography. This was geo-politics, which has hitherto been studied in the light of geo-politics, power politics and geo-strategy.

The concept of *Lebensraum* was introduced by Friedrich Ratzel, a German geographer.¹¹³ It was later adopted as a politico-ideological motto by the Nazi party led by Hitler with the conviction of *Volk ohne Raum* i.e. insufficient living space. Friedrich Ratzel had introduced the concept as part of his debate on human geography considering society as an organism and *lebensraum* as a habitat. However, it turned into a geopolitical argument seeking to justify nationalist aggression in World War II. The geopolitics of *lebensraum* eventually turned into racism from the platform of the National Socialist (Nazi) party. Hitler, in his *Mein Kampf* gave the concept of ‘inevitable expansion’ of *lebensraum* for the great German race, which was predestined to invade and colonize Europe.¹¹⁴ Thus, *lebensraum*, which was purely a geo-biological concept, became the basis of a racist ideology, which was employed through political means using military power. Likewise, Halford Mackinder’s Heartland Theory and the ‘geographical pivot of history’ pointed to the role of geography in global power politics.¹¹⁵

Political geography is not only concerned about global politics but also concerns everyday local politics. This is how it is directly related to political security and affects the political development of a region. The political course too affects geography in a number of ways. The United Nations Convention on the Law

¹¹³ Friedrich Ratzel, *Politische Geographie, German Edition*, originally published in 1897 (New York: HardPress Publishing, 2013).

¹¹⁴ Adolf Hitler, *Mein Kampf*, trans. Ralph Manheim (Boston: Houghton Mifflin Company, 1998). It was originally published on July 18, 1925.

¹¹⁵ Halford J. Mackinder, “The Geographical Pivot of History,” *The Geographical Society*, Vol. 23, No. 4 (April 1904): 421-437.

of the Sea (UNCLOS) is an apt example of political geography wherein a political decision has been taken to delineate the geographic bounds for political entities. The decision on the size of Exclusive Economic Zone (EEZ) is also a geographic dividend determined politically.

The effect of human geography on political security is direct and perpetual. The colonial empires expanded to maximize their power and enhance their security. They competed with each other for territory. They fought with the societal segments within the colonies to maintain hold on the colonized territories. For instance, the British Empire used every means to keep India in its clutches. It crushed the forces waging the War of Independence in 1857. It often massacred local protesters. The Jallianwala Bagh Massacre of 1919 is a case in point. The formation of alliances during the Cold War such as NATO and the Warsaw Pact were based on geopolitical and geostrategic considerations. Even in the post-colonial era, interstate and intrastate wars were fought for geographic reasons. Geography, in terms of territorial area, is the foremost attribute of a state. A government may be formed in exile without holding territory but a state cannot exist without a geographic area. Geography also helps states to guard against internal and external threats.

Political security as a subset of human security has a solid linkage with geography but has not been on the intellectual agenda of political geography. Geography actually works to strengthen or weaken the state of political security in a given geographic region or country. It also contributes towards the evolution of a political order or system in a region. The national political system e.g. democratization process has been influenced markedly by geography in some regions. The local political and governance system is also influenced by geography. The system of municipalities in major urban centres cannot be applied in mountain communities wherein effective governance has to be valley-specific. In sum, geo-humanism explores the role played by geography in the political and governance system as well as the state of human rights in a region.

The UNDP considers the economic security subset of human security in terms of ‘assured basic income – usually from productive and remunerative work or in the last resort from some publicly financed safety net’.¹¹⁶ Geography provides for the primary sources of economy in every region of the world e.g. habitable terrain on

¹¹⁶ “New Dimensions of Human Security”: 25.

which human settlements can be established, cultivable land for production of food, water and other natural resources for various processes of human life, and location which provides connectivity with other regions. It can also be said that agriculture is the basis of human economy, and it facilitates other economic sectors. Each type of geography has its own economic potential. For instance, fertile plains yield more than arid deserts and mountains. Let us take the example of the Gilgit-Baltistan (GB) region of Pakistan. It has a territorial area of 72,496 square kilometres. Some 94 percent of the region comprises high mountains and glaciers, 4 percent is covered with forest, 0.2 percent comprises built up areas, and only 1.8 percent is cultivated. This is a geographic impediment. On the other hand, GB's geography has abundant mineral resources and hydropower potential. It offers tremendous tourism and mountaineering opportunities, which can become the backbone of its economy. The oil wealth in the Arabian Peninsula is a dividend of geography and so are the diamonds of Sierra Leone and the Congo. On the other hand, the plains do not have much by way of natural resources but are rich in agriculture. The location dynamic of geography also serves as a basis of economy in context of internal and external trade. 'Geo-humanism' looks at the function of geography in economic security in a given region at all three levels — micro, meso and macro. It supports the idea of economic planning with the geography of the region in view.

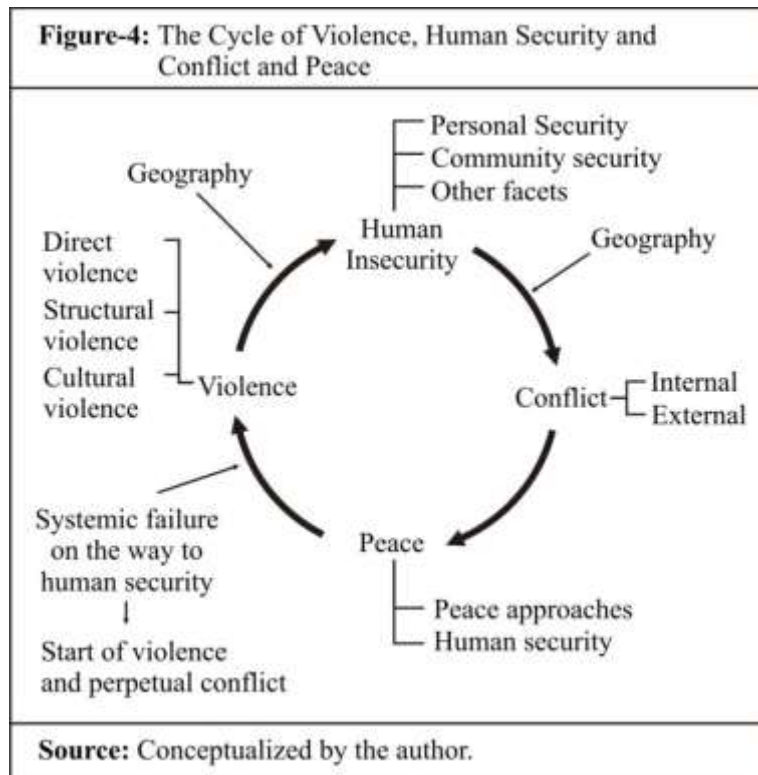
Personal security as a subset of human security is studied in terms of the safety and security of individuals against violence. Johan Galtung's violence triangle comprising direct, structural and cultural violence puts personal security into the perspective of peace and conflict studies. The UNDP notes, 'Perhaps no other aspect of human security is so vital for people as their security from physical violence'.¹¹⁷

Geo-humanism investigates the part played by geography in personal security in a region. Personal security, as endorsed by the UNDP, is a direct opposite of violence in a given region or state. Violence has a relationship not only with the security of people but also with general peace in the region. Even while violence itself takes many forms and shapes e.g. words, actions, social behaviours and systemic procedures, we often take into account the extreme form of violence as a result of which a person's life or property is imperilled. It is a basic human need 'to live'. This falls within the realm of human rights. To 'live' against all kinds of direct and indirect

¹¹⁷ Ibid: 30.

threats free from want and free from fear is the province of human security. Rights and security are interrelated in several ways. Johan Galtung considers this issue in terms of violence and peace, and has given its three forms: direct, structural and cultural.

Violence threatens human security across the entire spectrum of human life on a personal and community plane, perpetrates conflict both internal and external and upsets the state of peace. Various approaches are used to maintain peace. Human security is one such approach. Nothing sustains peace more than a satisfied population. Security is an antonym to violence. Thus, the way of violence breeds conflict, similarly security sustains peace. If we reverse the process, human insecurity serves as a cannon fodder for violence, which itself is the fuel of conflict. Thus, human security has a circular relationship with the state of violence, peace and conflict in a region. Here, it is important to note that geography influences the nature and type of violence as well as human security in a region. It takes the shape of a cycle, which continues in the course of history. An illustration is given in Figure-4.¹¹⁸



¹¹⁸ Conceptualized and illustrated by the author.

It may be seen that peace is ensured through application of peace approaches and human security in the state or region. The failure of the system to ensure an acceptable level of human security may give way to violence – cultural, structural and direct – and thus perpetual societal conflict. All this takes place in a given geographical context and area, wherein personal and community security may be gravely threatened alongside other facets of human security. Depending on the circumstances, the nature of violence and the geographic interface, the conflict may remain within the state or may transcend the boundaries of the state. It may also lead to interstate conflict or discord if other states are also affected due to geographic proximity or similarity of human geography.

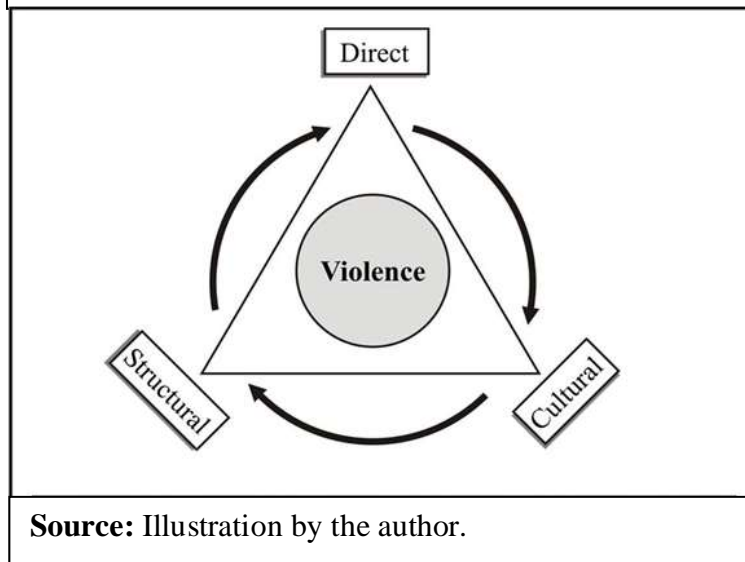
The violence-driven human insecurity takes many shapes. Johan Galtung notes that ‘in the beginning peace research was mainly concerned with direct violence, or violence as an intended human act, quick in execution’.¹¹⁹ He believes that if anyone in the developed countries dies due to tuberculosis, the cause of death is violent. This points to the difference between what could have been done and what actually happens. He notes, ‘Violence is that which increases the distance between the potential and the actual and that which impedes the decrease of this distance’.¹²⁰ What we generally understand as violence is direct violence according to Johan Galtung. He notes, ‘Thus when a war is fought there is direct violence where means of realization are not withheld, but directly destroyed. Thus when a war is fought there is direct violence since killing or hurting a person certainly puts his “actual somatic realization” below his “potential somatic realization”.’¹²¹ Later, other forms such as cultural and structural violence were determined. Johan Galtung’s typology of violence contains three main categories: direct, structural and cultural. These types are often illustrated in the form of a triangle (Figure-5).¹²²

¹¹⁹ Johan Galtung, *Theories of Conflict: Definitions, Dimensions, Negations, Formations* (Oslo, Norway: University of Oslo Press, 1971), 164.

¹²⁰ Johan Galtung, “Violence, Peace & Peace Research,” *Journal of Peace Research*, Vol. 6, No. 3 (1969): 168.

¹²¹ “Violence, Peace & Peace Research”: 169.

¹²² Illustration by the author. However, similar illustrations have been drawn by many writers to exemplify Johan Galtung’s typology of violence.

Figure-5: Johan Galtung's Violence Triangle.

Direct violence denotes actions that directly kill or harm an individual or community. It is physical expression of violence in the form of abuse, homicide and genocide etc. *Structural violence* means violence perpetrated by the structure or system using various ways and means. *Cultural violence* is committed by people against other people as part of their cultural ethos i.e. the culture encourages violence. As regards the hierarchy or the order of perpetuation, Johan Galtung notes, 'Generally, a casual flow from cultural via structural to direct violence can be identified'.¹²³ At another place, Galtung defines cultural violence as 'those aspects of culture, the symbolic sphere of our existence – exemplified by religion, language and art, empirical science and formal science – that can be used to justify or legitimise direct or structural violence.'¹²⁴

Galtung and Fischer note that 'direct violence is an event; structural violence is a process with its up and downs, and cultural violence is a "permanent" ... somewhat like the difference in earthquake theory between earthquake as an event, the movement of the tectonic plates as a process and the fault line as a more permanent condition.'¹²⁵ Galtung and Fischer also think of violence in terms of a three-strata image, supporting the violence triangle wherein cultural violence is the

¹²³ Johan Galtung and Dietrich Fischer, *Johan Galtung: Pioneer of Peace Research* (Berlin: Springer, 201), 47.

¹²⁴ Johan Galtung, "Cultural Violence," *Journal of Peace Research*, Vol. 27, No. 3 (1990): 291.

¹²⁵ Galtung and Fischer, 46.

foundational layer from which the structural and direct violence emanate. Direct violence is the topmost stratum: the pinnacle of violence. Johan Galtung also maintains that direct violence is only the tip of the iceberg of violence and is visible part of the evil. The body of the iceberg is made up of the cultural and structural violence, which is generally invisible. This denotes that the cultural and structural violence can be felt only while direct violence can be seen also. The direct, structural and cultural violence can also be understood in another way: *direct violence* is actor-to-actor violence; *structural violence* is structure-to-actor violence; and *cultural violence* is culture-to-actor violence. Actor here denotes the end security referent (in terms of UNDP's human security paradigm) i.e. individual and community. Conflict sociologists such as Louis Kriesberg argue that violence is organized around social cleavages such as race, class, ethnicity, and gender.¹²⁶ There are other groups like religio-sectarian communities that meet violence from contending communities.

The personal security situation in one geographic region affects the state of security in the adjoining regions too. Let us take the example of India. If the seven north-eastern states – also known as the seven sisters – were geographically separated, the state of security therein could have been different.¹²⁷ Likewise, the personal security situation in Afghanistan impinges on the security of Pakistan due to geographical proximity and similarity of human geography. The role of geography in personal security can also be seen in terms of cultural violence, which Galtung and Fischer believe to be a permanent feature. As culture is a vital part of human geography, the permanent nature of cultural violence is embedded in geography.

Community security is studied in terms of collectivity albeit the fact that communities are made up of individuals. A community may take any shape e.g. ethnic, linguistic, cultural, tribal, religious, sectarian or geographic. Community security may be threatened by conflict, strife, dissention, social exclusion, economic marginalization and politico-constitutional issues.

Community security in an area is dependent on the type of community structure i.e. whether civic or tribal. The size of population, the size of settlements, ethno-linguistic make and religio-sectarian composition also affect personal and

¹²⁶ Sean Byrne and Jessica Senehi, *Violence: Analysis, Intervention, and Prevention* (Ohio: Ohio University Press, 2012), 34.

¹²⁷ These states include Arunachal Pradesh, Assam, Meghalaya, Manipur, Mizoram, Nagaland and Tripura and are rife with internal security issues based on the struggle for secession from the Indian union or enhanced internal autonomy.

community security. All these facets are in turn dependent on the nature and type of geography. The other subsets of human security have direct dependence on geography. Community insecurity points to a threat posed to a community for being separate. For instance, the Rohingya community in Myanmar is facing persecution at the hands of majority Bamar community. The Bamar do not consider the Rohingya to be the citizens of Myanmar. Likewise, the Behari community of Bangladesh is being maltreated at the hands of majority Bengali community since the secession the country from Pakistan in 1971. The Bengalis do not consider the Beharis to be compatriots. This is being done in collusion with the state. Both the Rohingya in Myanmar and Behari in Bangladesh are centred on certain geographic zones — the Rohingya in the Rakhine state of Myanmar and the Behari in 66 squalid and camps geographical spread across Bangladesh.¹²⁸ The genocide of Rwanda's Tutsi community at the hands of the Hutu majority in 1994 has been one of the worst episodes of community insecurity. More than direct violence, communities often face structural and cultural violence. Both these facets are linked with the human geography of a state or region, and thus fall within the realm of geo-humanism.

'Food security', according to the UN, 'means that all people at all times have both physical and economic access to basic food'. The UN also includes 'food entitlement' of all people as part of food security.¹²⁹ Physical access denotes availability while economic access means affordability. The World Forum on Food Sovereignty defines Food Security as 'the people's right to define their own policies and strategies for the sustainable production, distribution and consumption of food that guarantees the right to food for the entire population.'¹³⁰ Geo-humanism delves into the role of geography in food security in a region.

Food is purely a product of geography. The amount of domestic food production in a region is proportional to the availability, cultivability and fertility of land. A region self sufficient in food grain production is more food secure not only because of accessibility and availability but also because of affordability at large. Climate, which is an attribute of physical geography, plays an important role in food

¹²⁸ Kazi Fahmida Farzana, "The Neglected Stateless *Bihari* Community in Bangladesh: Victims of Political and Diplomatic Onslaught," *Journal of Humanities and Social Sciences*, ISSN 1934-7227, Volume 2, Issue 1, (2008): 1.

¹²⁹ "New Dimensions of Human Security": 27.

¹³⁰ Final Declaration of World Forum on Food Sovereignty, 2001.

security. Alongside, increase in population, a feature of human geography may work to put strain on the food availability. In the history of mankind, many geographic regions on the planet have endured periods of famine due to geographic events such as drought etc. Likewise, surplus food that may be exported to other states of region is also supported by geography.

The geography-food security linkage dates back to the Paleolithic era when humans ate whatever was available in the form of flora and fauna. This relationship was reinforced during the Neolithic era with the onset of the First Agricultural Revolution around 10,000 BC when humankind formally engaged in agriculture. Agricultural geography continued to evolve with human progression. The planet later saw the Arab Agricultural Revolution, the British Agricultural Revolution, the Scottish Agricultural Revolution and the Asian Agricultural Revolution. The state of food security for human civilization continued to improve.

Sufficient food is being produced in the world. There are already political, administrative, management and business issues facing food security in the world and with the current population growth, human civilization may soon face food insecurity. The planet would fall short of grain and meat. There will be need to change the pattern of food production and the habits of food consumption. A significant part of the food grains being produced today is consumed by cattle. If meat consumption is reduced, a lot of food grains can be saved which can be consumed by humans. The calories from the grains would be twenty times more efficient than those from beef.¹³¹

History bears out that there have been periods in human history wherein some communities in the world indulged in infanticide, *inter alia* to match the size of families with the available food supply. The Palaeolithic and Neolithic era families often resorted to such practices. The Malthusian theory of population growth provides an interesting and pertinent idea. In 1798, Thomas Malthus argued that the world's population grows faster than the food supply. Thus, increase in food production on the planet remains less than the population growth. However, there are checks that limit the population increase to certain level such as epidemics, war, famine and calamities.

¹³¹ Paul A. Tucci and Mathew Todd Rosenberg, *The Handy Geography Answer Book* (Canton, USA: Visible Ink Press, 2009), 21.

His thesis is that there is a forced return of the human population to subsistence level when it goes beyond the level of food production on the planet.¹³²

A number of times in the history, our planet saw a population implosion due to various reasons such as wars, epidemics and calamities wherein hundreds of millions of people died in a single event or episode. Today again, the human civilization is undergoing a population explosion. The human population on the planet was about 275 million in the year 1000 AD. It reached 1.2 billion by 1850 AD and 3 billion by 1960. During the next 40 years, it doubled to 6 billion and is increasing by 100 million every year since then. It has now reached 7.4 billion. We might face another implosion due to an unthought-of, unforeseen and unanticipated event or process, which could slash the human population on the planet by many millions or even billions. The animal population on the planet also undergoes various cycles of breeding. All this has a linkage with food security and in turn geo-humanism.

Health security is defined by the UN as access to preventive and curative medicines and services, nutrition, clean water and clothing while the main threats are: deadly infectious diseases; unsafe food; malnutrition; and lack of access to basic healthcare.¹³³ Health security of individuals and communities in a region has a definitive linkage with physical and human geography and climate, and thus falls into the domain of geo-humanism.

Health security in a given region is greatly influenced by geography and climate. Human civilization has endured a number of area specific diseases and epidemics. High altitude regions, plains, deserts, tropical forests and equatorial region have their specific health requirements because of the altitude related and climate specific ailments. To mention, high altitude pulmonary oedema (HAPE), high altitude cerebral oedema (HACE), acute mountain sickness (AMS), hypoxia, hypothermia, cold injury, frostbite and chilblain etc are all high altitude diseases often endured by the people of these regions or the visitors from other areas. The tropical areas have such diseases like malaria, tuberculosis, parasitic ailments and other infirmities spread by various kinds of viruses. So, health security falls in the realm of geo-humanism and needs to be studied and addressed in the light of geographic imperatives.

¹³² Alan Macfarlane, *Thomas Malthus and the Making of the Modern World* (North Charleston: CreateSpace Independent Publishing Platform, 2013) provides a detailed perspective on the subject.

¹³³ Ibid.

According to the UNDP, environmental security refers to policies and practices to ensure sustainability and protection of land, air, water, etc; and the main threats identified are environmental degradation, resource depletion, natural disasters and pollution.¹³⁴ Environmental security is the core of human security virtually in all regions of the world especially those frequently threatened by natural hazards. Thus, environmental security or insecurity is purely a function of geo-humanism. Earthquakes, tsunamis, volcanoes, cyclones, tornadoes, hurricanes, sandstorms, lightning, wild fires, avalanches, snow slides, landslides, heat waves, cold waves, droughts, river floods, flash floods, glacial lake outburst floods (GLOFs), crevasses, and coastal erosion are a few environmental hazards to note in this regards. All these are linked with the type of geography of a given region. They are primarily a province of physical geography and a function of changes that occur in our environment. It is because of threats in the realm of physical geography in the form of hundreds of active volcanoes surrounding Pacific Ocean that it is called the Ring of Fire.

Climate change is the core issue of environmental security, and is being debated at policy forums as well as in the in the scientific community. It has become one of the major policy concerns in the developed countries. The phenomenon of climate change equally affects all parts of the planet, perhaps more the underdeveloped regions because of weak policy responses and technological shortfall. Besides, the geography of a given region also multiplies or reduces negative effects of climate change. Even though the industrial nations have bigger share in the climate change and global warming processes, the share of effect is likely to be borne more by the underdeveloped countries. Hence, they need not to take the climate change as an issue of the West alone. It is very much ‘everyone’s concern’. Certainly, actions are needed by the international community at global level. However, a number of actions are required to be taken at local level by geographic communities e.g. in GB.

Nobel Laureate Paul Crutzen coined the term ‘Anthropocene’ to describe the rapid and profound changes that are sweeping across the planet today.¹³⁵ Anthropocene succeeds the previous geological epoch called ‘Holocene’.¹³⁶ This

¹³⁴ *UN Human Security (HS) Handbook-2009*. and “New Dimensions of Human Security.”

¹³⁵ Stoermer and Crutzen quoted in Katherine Richardson, Will Steffen and Diana Liverman, ed., *Climate Change: Global Risks, Challenges and Decisions* (Cambridge: Cambridge University Press), 483.

¹³⁶ Sverre Raffnsøe, *Philosophy of the Anthropocene: The Human Turn* (London: Palgrave Pivot, 2015), 3.

denotes that our planet has entered a new climatic era wherein our environment is shaped by the humankind itself rather than vice versa or external forces. The physical features of the geography of earth have been altered by humankind greatly. The transformation of natural processes set in motion by humanity is ‘on a scale comparable with some of the major events of the ancient past.’¹³⁷ Anthropocene points to disturbance of the earth’s ecosystem and geological cycles, and thus tends to change the whole scene and sense of security. Some of the scholars argue that Anthropocene is not a standard term and has yet to be recognized by distinguished international geographical and geological forums, societies and institutions.

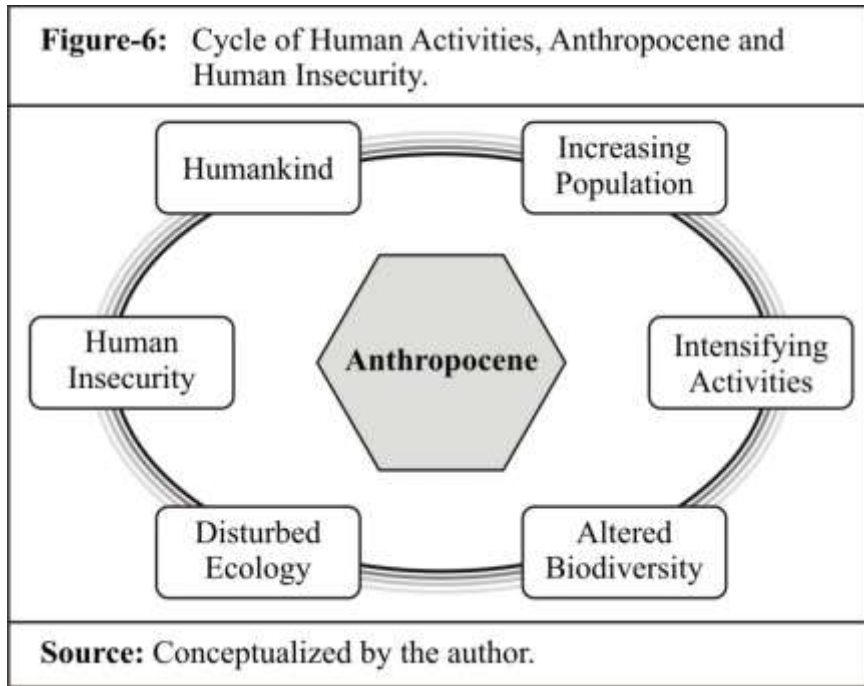
The beginning of Anthropocene is conflicted. There are scientists who believe that it had dawned thousands of years ago. There are others who consider it to have started with the first nuclear detonation – the Trinity Test on July 16, 1945. Yet others suppose that Anthropocene had kicked off with the start of Industrial Era.¹³⁸ Immense machine activity, increasing number of locomotives and automobiles and construction of major urban centres infested the planet earth with heat, smoke and pollution. It changed the geographical characteristics of the planet, infected its atmosphere, altered biodiversity, shrunk the habitat of living beings other than humans, accelerated the extinction of various species, and thus began a new era in the geological history of the planet. Climate change is one of the effects of Anthropocene.

What and how much is true is up to the scientific fraternity to determine. But the fact remains that our planet has already entered into Anthropocene due to growing human population and increasing human activities on the planet. This, in turn, affects human security at large. The case can be evaluated in terms of a cycle illustrated in Figure-6.¹³⁹

¹³⁷ Jan Zalasiewicz quoted in Simon Dably, “Human Security in Anthropocene: The Implications of Earth System Analysis,” in *A Changing Environment for Human Security: Transformative Approaches to Research, Policy and Action*, ed., Linda Sygna, Karen O'Brien and Johanna Wolf (New York: Routledge, 2013), 27.

¹³⁸ Ibid.

¹³⁹ Conceptualized by the author.



Human population on the planet is increasing fast and human activities are intensifying correspondingly. This is what has triggered the Anthropocene, which we often see in the form of climate change. It has not only altered the biodiversity but also disturbed the entire ecosystem of the planet. This perpetrates human insecurity in the form of environmental disasters, which also affect other subsets of human security.

This is pure geo-humanism in environmental or geological terms. We can say that the Anthropocene has engendered a new human culture, the anthropogenic culture, wherein humankind is living in the environment transformed by its own follies under whatever compulsions or pressures of livelihood. This certainly has a price. According to Joseph Wood Krutch, “Nature takes no account of even the most reasonable human excuses.”¹⁴⁰

The UNDP’s HDR-1994 considers the above-described subsets of security. Certainly these are overarching human security issues applicable to virtually all communities, societies, states and regions. However, there are many other region-specific human security issues, which must be taken into account as part of a practicable human security paradigm. More so, UNDP’s model primarily lays

¹⁴⁰ Joseph Wood Krutch quoted in Katherine Richardson, Will Steffen and Diana Liverman, ed., *Climate Change: Global Risks, Challenges and Decisions* (Cambridge: Cambridge University Press), 472.

emphasis on human development without really referring to and addressing the sources of insecurities. Taking into consideration the role of geography as an impediment and expedient is one such important approach.

The additional facets include subsets such as communication security, women security, children security, education security, energy security and water security. *Communication security* comprises air, road and rail network besides movement across seas and over river and canal waters. It also includes wireless, telephony and postal communication. *Women security* may be defined as empowerment of womenfolk, availability of equal opportunities at par with men, and protection against gender biases and gender-based threats both at home and places of work. *Children security* needs special consideration as part of a human security framework. Children security may be defined as children's access to food, shelter, clothing, education and health facilities, and security against juvenile exploitation. *Education Security* denotes the state of education and literacy in a region or country. Education and knowledge occupy the centre stage in all human affairs and can thus be termed as the backbone of human security, and merits to be a separate subset therein. *Energy security* is the fodder of all subsets of human security. It is defined in terms of accessibility, adequacy and capacity. It is also defined in terms of "ensuring the availability of energy resources that are diverse, in sustainable quantities, available at affordable prices, support economic growth and assist in poverty alleviation measures."¹⁴¹ 'Water is life' is a famous axiom. It is purely a dividend of geography and is the backbone of human security in all geographic environments. *Water security* ensures food and economic security and affects all other subsets of human security in varying degrees.

Working Definition

Geo-humanism underpins the role of geography in human security. It reckons that geography is the foundational driver that shapes human security in any area, region or state on the globe.

Conclusion

The geography-humanity relationship exists since the birth of humankind and geography has been playing its role in shaping the human life in all possible ways.

¹⁴¹ Ram M. Shrestha and S. Kumar, "Energy Security for Developing Countries," GNESD Expert Meeting and Assembly, *Asian Institute of Technology*, Poznan, Poland (December 9, 2008): 5.

The discussion in this chapter bears out that geography has a considerable effect on human security, as defined and described by the UNDP. This is what has been termed as the theory of geo-humanism. To be successful on the way to improve human security profile of a region, state or area, it is imperative to study it in the light of geo-humanism i.e. viewing the impact of geography on various subsets of human security, and applying governance approaches as well as the modern technology in keeping with the geographic imperatives.

Chapter-3**PHYSICAL GEOGRAPHY OF GILGIT-BALTISTAN**

“Unexplored paths [of geography] lead to undiscovered treasures.”

– Constance Chuks Friday¹⁴²

Geography literally means the science of the earth. It is one of the branches of learning and is a mix of several fields of study. It is the study of the feature and phenomena of earth, human processes, and man-man and man-earth relationships. Often split into physical and human geography, it falls into the realm of natural sciences in terms of the former and a part of social sciences when seen through the prism of the latter. Human geography in a given region has a definitive linkage with physical geography. The anthropology of desert regions is diametrically opposed to the mountainous areas just like the way their physical landscapes are different. The case of other geographic regions on our planet is no different. Likewise, most regions otherwise located at different places on the planet but with similar physical features have many things in common even in terms of human characteristics. For instance, the cultures of the Gobi desert and Sahara desert do bear similarities. Likewise, the people of the Schwarzwald (Black Forest) in Germany do have some cultural resemblance with the Monteverde Cloud Forest Reserve of Costa Rica. Most mountainous areas in the world are similar to each other in some respects.

Gilgit-Baltistan is a classic embodiment of geography – a purely mountainous composition. Nothing more distinct than geography can express GB. Gilgit-Baltistan has been known by various names due to its geographic makeup and location. These include: Where the three empires meet; Where men and mountains meet; A window into China; A window into the iron curtain (Russia); Hinterland of Asia; Rooftop of the world (though it is technically incorrect; actually the Pamir region of Central Asia is known as that); the Head of Pakistan; and the Water Tank of Pakistan. It can also be named as the mountain capital of the world. It is a meeting point of the four highest watersheds in the world – the Pamir, Hindukush, Karakoram and the Himalayas. These four mountain ranges act as lofty barriers all around. The Hindukush range cuts off GB from Khyber-Pakhtunkhwa province of Pakistan and Pamir from the Wakhan Corridor Afghanistan and Central Asia. The Himalayas separate GB from the Ladakh

¹⁴² Constance Chuks Friday cited in “Quotes about Geography,” <http://www.goodreads.com/quotes/tag/geography> (accessed October 12, 2014).

region of Indian Occupied Kashmir (IOK) and Azad Jammu and Kashmir (AJ&K), and the Karakoram acts as a divider between GB and the Xinjiang region of China. Thus, GB is a natural geographic fortress unparalleled in the world.

Various geographic concepts include frontier region border region, remote region, marginal areas, wilderness and unexplored areas. All these concepts are applicable to one part of the GB region or others. GB is connected with the adjoining regions through high mountain passes. Some of these passes cross over glaciers. GB takes the form of an asymmetrical bowl built by these towering mountain walls. Thus, the term landlocked looks little when applied to GB, which can rather be termed mountain-locked. All said, GB is known for its different and difficult geography.

To study the geography of GB, the five themes of geography provide one of the most suitable analytical frameworks and have, hence, been chosen for the purpose.¹⁴³

Location

Location has two main categories: absolute location and relative location. The absolute location of Gilgit Baltistan is 35.8026° N, 74.9832° E. The relative location describes a place by pointing to its surroundings / the places nearby. Gilgit-Baltistan is located between Xinjiang (China) to the north / northeast, Central Asia to the north / northwest, Wakhan Corridor of Afghanistan to the west / northwest, Chitral (Pakistan) to the west, Swat and Hazara (Pakistan) to the south, AJ&K to the south, Ladakh to the east / south, and Tibet (China), the distant neighbour, to the east / southeast. Figure-7 shows the location of GB in the region.

Gilgit-Baltistan is located amidst the largest mountain mass of the world comprising eight gigantic mountain ranges including the Pamir, Hindukush, Karakoram, Himalayas, Kunlun, Pishkom, Transalay and Tien Shah. This mountain mass can be termed the mountainous crescent because of its shape as such. Figure-8 contains details.

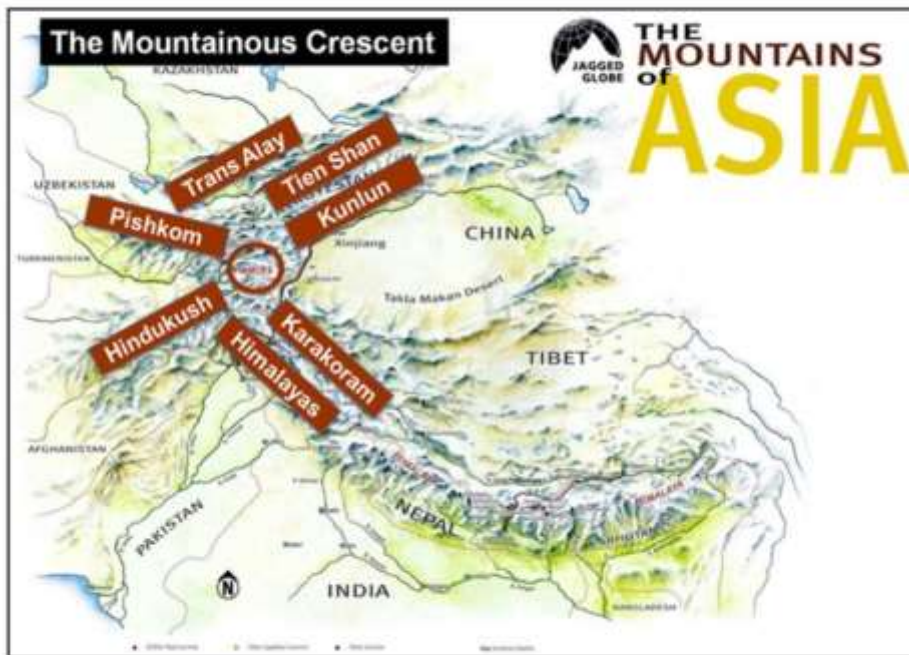
¹⁴³ In 1984, the National Council for Geographic Education and the Association of American Geographer published Guidelines for Geographic Education. Five themes were identified: location, place, movement, human-environment interaction and region.¹⁴³ Alex Standish, *Global Perspectives in the Geography Curriculum: Reviewing the Moral Case for Geography* (New York: Routledge, 2008), 26. Since 1984, countless books have published around the world, especially in the US, to study various countries and regions using the five themes as analytical tools.

Figure-7: Relative Location of Gilgit-Baltistan in the Region



Source: Map by the author.

Figure-8: The Mountain Crescent.



Source: Maps by vertebrate graphics, UK. Overwriting by the Author.

33 great rivers flow from these gigantic watersheds from Central to South Asia and the western part of China. There are three hubs of mountain within this crescent located in Gorno-Badakhshan Autonomous Region of Tajikistan, Baltoro region Baltistan division in Pakistan, and Khumbu region of Nepal. The mountainous crescent is home to three different civilizations to include South Asia, Central Asia and China based on the sources of water. The Indus valley civilization is one of the oldest in the region. Professor Manzoom reckons that GB is geographically part of Central Asia and politically part of South Asia. He asserts, “The geography, landforms, climate, economy and ethnicity of GB, Chitral, Wakhan Corridor and Central Asia is the same.”¹⁴⁴

Professor Manzoom Ali has conducted deep research on the geography of the GB region. However, geographical evidence stands against this assertion. The lay of the ground and the position of the greatest watersheds of the world in this region which is made up of the Pamir, Hindukush, Karakoram and the Himalayas (PHKH), and the direction of rivers flowing from these mountains largely determine the location of GB. Primarily the northern boundary of South Asia is marked by PHKH watersheds. The PHKH also serves as the southern boundary for China and the eastern boundary for Afghanistan and Central Asia region. All rivers flowing into Chitral, GB, Ladakh and Kashmir finally enter South Asia, chiefly Pakistan, before ending up in the Arabian Sea (Indian Ocean). These rivers flow in north-south direction from the HKHP watersheds.

On the other hand, there are two major rivers, namely Amu Darya and Syr Darya, which originate from Pamir and drop into the Aral Sea in Central Asia. Both move in an east-west direction. On the two sides of the Karakoram mountain range, the Indus river drainage system and the Tarim river drainage system mark the Pakistani and the Chinese sides respectively. This geographical argument was presented to Professor Manzoom Ali in response to which he said: “We can call Gilgit-Baltistan ... a transition zone or a buffer zone between South Asia and Central Asia.”¹⁴⁵

¹⁴⁴ Professor (Emeritus) Manzoom Ali, Telephonic interview by author, Gilgit, May 3, 2016. Professor Manzoom Ali, *Karakoram-Hindukush* (Islamabad: Burq Sons, 1985), 1 contains brief perspective. Mr Manzoom Ali has been professor of geography, is a celebrated author on Gilgit-Baltistan affairs, especially geography and has published some very authentic maps of the region.

¹⁴⁵ Ibid.

Thus, GB is geographically different region than Central Asia and is rather a part of South Asia. Likewise, the Yarkant, Karakax, Yurungkax, Shaksgam and Keriya rivers are flowing into Xinjiang Uighur Autonomous Region (XUAR) of China in a south-north direction. This also corroborates the fact that GB is a region different from Xinjiang even though in the past the states of Hunza, Nagar, Shigar and Khaplu did have trade and diplomatic relations with Xinjiang more than the Central Asian region. The states in Baltistan had relations with Ladakh and Tibet even during the Buddhist era. Ethnically too, if we consider the case of people from northern and western sub-regions of GB i.e. Hunza and Ghizer etc to be from the Central Asian stock, the people from Baltistan and Diamer regions are not so. The Balti people are more like Tibetans and the people from Diamer division are akin to their Hazarewal and Swati neighbours. All said, GB serves as the crossroads of China, South Asia and Central Asia, but the region itself is geographically as well as culturally part of South Asia albeit it does have resemblance with Central Asia in terms of human geography.

GB falls into the category of special socio-geographic regions of identical groups such as remote regions, frontier regions, border regions, marginal regions and the regions containing wilderness. Dr Shafqat Hussain gives a comprehensive perspective on it.¹⁴⁶ Such regions have dissimilar characteristics compared with the geographic mainland or the core of society as is the case of GB when seen in relation to Pakistan. The state is often found absent from these areas in a number of ways. Certainly not GB, but some such regions on the globe are also called the “ungoverned spaces” due to virtually the total lack or collapse of governance system. Thus, they largely remain to be tribal societies ruled through tribal codes and customs.

GB has always been so when analyzed with regard to relative location pointing to its remoteness. It has been remote and away from the centres of power in the wider Asian region e.g. Delhi, Karachi, (later) Islamabad, Moscow, Kashgar and Kabul. However, GB as a region is remote yet not marginal even though there are pockets of marginality within GB. Marginal areas may not be necessarily located away from the power centres. The slums and ghetto within a metropolitan area are marginal, not remote. Certainly, in some cases, a region may be both remote and marginal.

¹⁴⁶ Dr Shafqat Hussain, *Remoteness and Modernity: Transformation and Continuity in Northern Pakistan*.

According to Muhammad Qasim Naseem, “Before 1948, a person from Skardu used to reach Rawalpindi in one month via Naran and Swat staying a lot of nights *en route*.”¹⁴⁷ This aspect has been addressed well after 1948. According to Ghulam Hussain, a social activist from Hushe village, “Compared with the remaining provinces of Pakistan, Gilgit-Baltistan (GB) is a remote region; within GB, Baltistan is a remote area and within Baltistan, Hushe is a remote village. Because of remoteness, human development level of GB is not at a par with other provinces.”¹⁴⁸ Another native of Hushe village said, “Because of remoteness, there is a general absence of governance in areas like Hushe. The government employees deputed to such areas try to get themselves posted elsewhere. There are no metalled roads. The fair-weather tracks are often blocked due to snow or landslides. Power shortages and load shedding of electricity is comparably more. The natives of remote valleys face health issues more than those in main valleys. Women in the family way do not get necessary medication.”¹⁴⁹

Both of them are right. Remoteness, together with higher elevation, is a foundation on which the human insecurities of various kinds bloat in several valleys and villages of GB. A few to note are: Hushe valley in Khaplu district, Shagharthang, Gultari and Matiyal valleys in Skardu district, Upper Braldu and Basha valleys in Shigar district, Shimshal and Chipurson valleys in Hunza district, Haramosh valley in Gilgit district, Karambar, Yasin and Shandur valleys in Ghizer district, Hispar and Hoper valleys in Nagar district, Ingut and Kandrak valleys in Kharmang district and upper reaches of Darel and Tangir valleys in Diamer district.

Remoteness has tremendous effects on human security. Take the example of Gultari, a tehsil of Skardu district. It has two union councils with a total of 32 villages.¹⁵⁰ Due to closure of the passes leading to it i.e. Burzil and Torgund during winter, it remains cut off from Skardu and Astore for 5 to 6 months. Thus, it remains without various facilities and amenities during winter. Even during summer, the

¹⁴⁷ Muhammad Qasim Naseem, author and Editor Weekly Siachen News, Interview by author, Skardu, September 26, 2015.

¹⁴⁸ Ghulam Hussain, President Hushe Welfare and Development Organization, Interview by author, Hushe village, Khaplu district, February 21, 2016.

¹⁴⁹ Muhammad Anwar, President Village Conservation Committee (VCC) of Hushe, Interview by author, Hushe village, Khaplu district, February 21, 2016.

¹⁵⁰ Ghulam Raza Haideri, Interview by author, Skardu, March 29, 2016. Mr Haideri is a social activist and a tour operator. He is also a local politician and was a Pakistan People’s Party candidate for GBLA membership in June 2015 elections. He did not succeed in the election.

human security conditions are not encouraging. The entire tehsil has a few primary and middle schools but no high school. There is not even a single primary school for girls in the entire Gultari tehsil. The girls in Gultari have three choices: (1) Go out of the tehsil to Skardu or elsewhere and study; (2) Even though there is no girls school in Gultari, the parents send their girls to the boys primary schools in a couple of villages to seek education up to class five; or (3) Do not study at all. Hence, most of the girls in Gultari tehsil do not study because most of the parents cannot afford to exercise the other two options. Boys too study up to middle standard. A few, who could afford to go to other cities including Karachi, have left.

The area faces serious troubles with regard to health security. There is no health facility for women. Dozens of women die every year during child birth due to lack of health facilities.¹⁵¹ In 1996, some 103 children died due to epidemic and lack of medical treatment. A ten-bed hospital was constructed in Bunyal by the Health Department of GB a few years ago but it is not functional at all. There is no medical staff in the hospital. There is a basic health unit (BHU) in Khar village. It just treats people with ordinary diseases but has no capacity to handle delivery cases of women. According to Mr Haideri, “Some of our villages are still in the Stone Age. The others are at best in 16th or 17th century, but not in 21st century, to say the least.”¹⁵² The condition of a number of other remote valleys suffering from “winter cut-offs” is no different. For example, there is not even a single high school in any of the 22 villages of Braldu valley in Shigar district. Education is limited to middle standard (Grade 8). Most of the villages have only a primary school (up to class 5). Health, water and sanitation issues further complicate the situation.¹⁵³

Place

Place implies what kind of location it is. It includes both *physical* and *human* features and characteristics such as mountains, rivers, valleys, jungles, plains, deserts,

¹⁵¹ Ghulam Raza Haideri. Even though the figure is a little exaggerated, the women in Gultari certainly face serious health issues.

¹⁵² Ibid.

¹⁵³ Abid Hussain, Interview by author, Tistey, Shigar District, February 3, 2016. Abid Hussain is a clerk in a private school at Skardu. He hails from Tistey, the last human habitat in the Upper Braldu Valley in Shigar district. This valley is located in the Central Karakoram Region and further leads to the Baltoro glacier around which four (out of total 14 in the world) eight-thousanders to include K-2, Broad Peak, Gasherbrum I and Gasherbrum II, and some 68 seven-thousanders are located. People of this valley are suffering from some of the very tough human security issues. The author visited this valley and interacted with the people in various villages 23 times during two years. The interview in reference was one such interaction.

beaches, flora and fauna. GB is a mountainous zone made up of highlands to include the Pamir, Hindukush, Karakoram and the Himalayas (PHKH), narrow valleys and deep gorges inhabited by the people of both Indo-Aryan and Mongol origin.

According to *the Imperial Gazetteer of India*, “nowhere else in the world, probably, is there to be found so great a number of deep valleys and lofty mountains in so small an area.”¹⁵⁴ The elevations in GB vary between 3,000 feet and 28,250 feet above means sea level. Five out of fourteen eight-thousanders (mountain peaks with height above 8,000 meters above sea level) are located in Gilgit-Baltistan region of Pakistan. Likewise, twelve out of thirty top peaks in the world with elevation above 7,500 meters are located in Gilgit-Baltistan.¹⁵⁵ On the whole, some 109 peaks with height more than 7,000 M (including five eight-thousanders) are located in Pakistan, mainly in GB and Chitral district (**Annex A**).

Gilgit-Baltistan has an ancient geological makeup, with some of the world’s oldest rocks forming the highly stratified Precambrian peak groups such as Gasherbrum, Masherbrum, Baltoro, Rakaposhi, Ultar, Diran, Broad Peak, Muztagh towers, Trango Towers, Batura, Saltoro Kangri (actually *gang-ri* in Balti language meaning the glaciated mountain) and countless others.¹⁵⁶ The region also contains some of the largest glaciers outside the polar region. GB has 5,100 glaciers, 2,200 square miles of snow covered area and 119 large size lakes.¹⁵⁷ Almost 12 percent of the region is shaped by mightiest glaciers such as Siachen – 76 km long, Hispar – 61 km, Biafo – 62 km, Baltoro – 58 km, Gasherbrun – 38 km, Chogo Lungma – 38 km, Passu – 32 km, Batura – 58 km, Rupal 29 km, Nabandi – 32 km, Braldu – 30 km, Snow lake sim glacier – 20 km, along with hundreds of other glaciers.¹⁵⁸ List of 242 larger glaciers in GB is attached as Annex B albeit there are many more glaciers of different sizes. In the form of bio-diversity, GB has four national parks (including Khunjab National Park, Central Karakoram National Park, Deosai National Park, Shandur-Phander National Park), nine game reserves, three wild life sanctuaries, 230

¹⁵⁴ Hunter, 1885, 77-81.

¹⁵⁵ Zain, 2010.

¹⁵⁶ C.C. Trench, *The Icy Baltistan* (Oxford: Oxford University Press, 1992), 31.

¹⁵⁷ Imran Sikandar Baloch “Tourism Development in Gilgit-Baltistan,” (October 2014), *Government of Gilgit-Baltistan*, http://www.gilgitbaltistan.gov.pk/images/stories/bus-pot_pdf/Tourism.pdf (accessed March 26, 2016).

¹⁵⁸ M. A. Stein, *The Wonders of Hindukush* (New Delhi: Sterling Publication, New Delhi, 1987), 74.

species of birds, 54 species of mammals, 20 species of fresh water fish, 23 species of reptiles, and six of amphibians.¹⁵⁹

With the cis-Karakoram features, trans-Himalayan character of geography, rarity of monsoon and other seasons characterizing plains,¹⁶⁰ close connection with the Pamir Knot in the Central Asia, and a host of mountain junctions and semi-Pamir within, GB can rightly share the description ‘the Roof of the World’. GB is more than a mere landlocked region. Surrounded by highest watershed in the world, it is connected with the adjoining regions via high mountain passes, both frequented and unfrequented. A list of important passes is attached as Annex C.

GB is known as the water tank of Pakistan. There is virtually no dry area in the region. The habituated and cultivated areas have enough water to support these activities. List of 39 large rivers of GB and 208 small rivers/ torrents which flow into the large rivers is attached as Annex D. The Indus River, flowing across the entire length of the country, provides for geographical definition of Pakistan. It enters into Pakistan through Kharmang district of Baltistan. It has six main tributaries within GB including Shingo River, Shyok River, Shigar River, Hunza River, Gilgit River and Astore River. There are a number of sub-tributaries that flow into the Indus River or its tributaries. Actually, all rivers and torrents of GB flow into the Indus River before it exits from GB into Kohistan district of Khyber-Pakhtunkhwa. The officially declared hydro power potential in GB is about 40,000 MW but actual capacity is believed to be more. In addition, the hydropower potential of sub-tributaries is about 1,200 MW.¹⁶¹ The human settlements and agricultural activities in GB take place in valleys. There are dozens of large size valleys based on waterways in all ten districts of GB.

Human-Environment Interaction

The GB region is characterized by a peculiar human-environment interaction. Actually, this theme epitomizes geo-humanism, is discussed at length in Chapter 4&5.

Movement

People, goods and ideas have been travelling from one region to the others. It can be said that the history of humankind is the history of human movement. So is the

¹⁵⁹ Imran Sikandar Baloch. Pakistan has a total of 26 national parks of which four are located in GB.

¹⁶⁰ Dani, 2001.

¹⁶¹ “Hydro-Power Potential and Investment Prospects in Gilgit-Baltistan,” www.gilgitbaltistan.gov.pk/.../InvestmentPotential/HydroEnergy.pdf (accessed March 26, 2016).

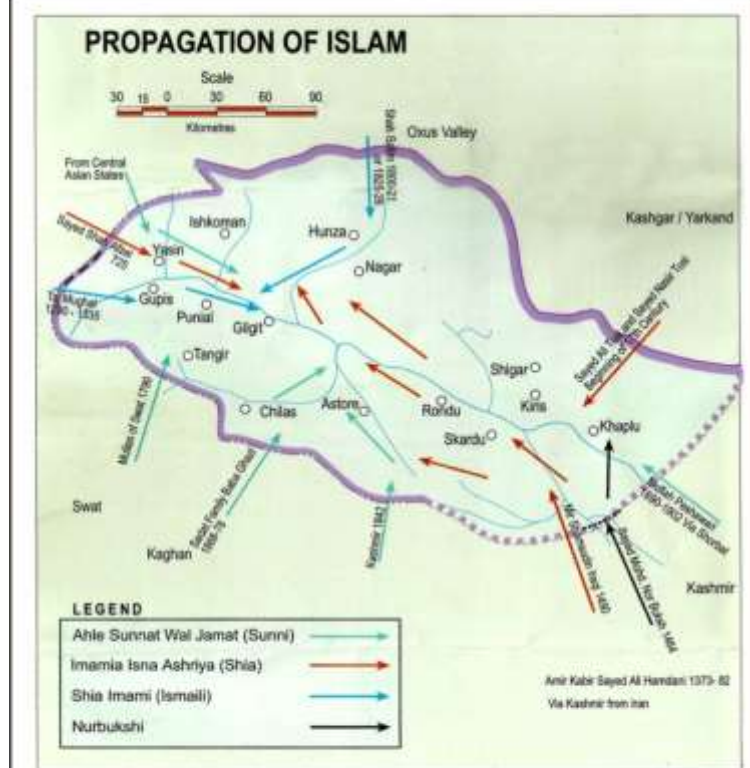
case of GB. Geography of GB has been acting as a corridor enabling exchange between societies. People from the adjoining regions and countries have been travelling to and from GB. These areas included: Central Asia, Afghanistan, Chitral, Swat and Hazara (now parts of Pakistan), Xinjiang (China), Tibet (China), Ladakh and other parts of Kashmir (both AJ&K and IOK). GB has also acted as a transition zone between the adjoining regions.¹⁶² GB is coming up as an important geographic link in the China-Pakistan Economic Corridor (CPEC). It has been a trade corridor in the past also in the form of the Silk Route.

According to Mr Bercha, “The mountainous geography takes time to evolve. Armies after armies came to the plains and deserts of the South Asian Subcontinent besides groups and companies of traders. This led to development of the deserts and plains geographic regions of deserts and plains. In case of Gilgit-Baltistan, the arrival of armies and large groups of traders has been a rare phenomenon. In most cases, the individuals like Alberuni and Marcopolo visited the region.”¹⁶³ *Inter alia*, this led to comparatively low human development of the GB region.

Historically, movement in and through GB region has been for the purposes of trade, preaching of religion and movement of military forces. A map showing the progression of Islamic preaching is shown as Figure-9.

All these brought new ideas, culture and customs. Trade caravans have been moving to and fro Central

Figure-9: Map of Progression of Islamic Preaching.



Source: Map by Professor Manzooom Ali, Gilgit, 2016.

¹⁶² Manzooom Ali, 2016.

¹⁶³ Sher Baz Ali Khan Bercha, Interview by author, Gilgit, November 26, 2015. Mr Bercha is an author, historian and ex senior librarian of Gilgit.

Asia, Xinjiang, Ladakh, Tibet, Kashmir, Chitral, Swat and Hazara. After the creation of Pakistan, the notion of movement changed radically. Construction of the Karakoram Highway between Pakistan and China, the road across Babusar Pass connecting Diamer district and Naran district of KPK, and through Shandur Pass connecting Ghizer district and Chitral district in KPK have brought qualitative change. Air transport connecting Skardu and Gilgit with other provinces of Pakistan adds to movement. Many people from GB have second homes at Rawalpindi, Islamabad, Karachi and some other cities. Students from GB are studying in all parts and provinces of Pakistan. All this has worked to transform the culture of GB, which is being gradually but inexorably *Pakistanized*. During the last seven decades, GB has moved from geographic isolation to inclusion and remoteness to proximity, and inaccessibility to accessibility. However, movement towards Ladakh has stopped due to the state security paradigm.

Region

A region is a basic unit in the study of geography. Region is an area that has unifying characteristics, which may range from physical to human. It is located on the intersection of geography, history, anthropology, regional economy and geopolitics. Geography is the floorboard of all other aspects. The people of the area also believe in GB to be a complete region. The first question in the survey conducted for this thesis was: *Do you think that Gilgit-Baltistan is a complete geographic, cultural and political region or unit?* The response of the people has been predominantly in the favour of GB being a region.

Located within the South-Central Asian Highlands formed by the highest watersheds in the world, GB is a region by all definitions and characterizations. Physically, it is a region with mountainous geography and distinct geological characteristics that distinguish it from the adjoining, seemingly similar, regions. The GB region has a shared history that goes back millennia. Even while the region has been shrinking and expanding in the political realm, the areas part of today's GB have had shared historical roots.

By human characteristics, the GB region embodies a diversified homogeneity containing ethnic, linguistic and sectarian divisions. Anthropologically, the people of the region are admixture of Balti with Tibeto-Mongol lineage, Dard who have Indo-Aryan bloodline and Yashkun who are Mongols by lineage. Yashkun came to GB in BC era from Tajikistan and Kazakhstan, Uzbekistan, Mongolia and the areas south

Russia. They escaped local tribal wars and entered GB through various passes. The highland abode, military expeditions and trade dependency led to cross-marriages and social bondages to an extent that despite internal anthropological distinctions, the people are known outside the region as identical.

Historically, most of the GB region has been Bon-Chos by religion, which was succeeded by Buddhism. Islam came to the area in the fourteenth century. The area today has four main sects including Shia, Sunni (including Ahle Hadith), Ismaili and Noor Bakhshi in the same precedence of population size. Yet, religious harmony and similarity of religious traditions exist to a great extent (barring some pockets with huge religious discord).

GB is a region by socio-cultural traditions and internal similarities. The social imperatives and culture of the area are primarily driven by the physical geography including climatic conditions. Human geography of GB is actually a true reflection of its physical geography. GB has language diversity to the extent that Urdu (the national language of Pakistan) acts as the *lingua franca* for the people from various areas of the region, yet, there are unbreakable linguistic connections which further strengthen the state of the areas as a human geographic region. Politically, GB became a region of Pakistan soon after independence. It evolved into a distinct political region in 1970s when declared a unit called *Northern Areas*. But earlier, it was a single unit during the Dogra rule from 1840-46 to 1947-48. Economically, GB is an undeclared economic region of Pakistan, shaped so by the geographic imperatives (both physical and human) and political status.

Chapter-4**HUMAN GEOGRAPHY AND CONTEXTUAL MAKEUP OF GILGIT-BALTISTAN**

“Gilgit-Baltistan is heterogeneously a homogeneous region.”

– Ehsan Mehmood Khan

GB has been a heterogeneously homogeneous region throughout its history. Administratively and politically, it has been shrinking and expanding. For some periods in time, Chitral and Ladakh have also been part of the state(s) in GB. During other times, parts of GB have been ruled by external powers such as Central Asian, Chinese and Tibetan. Professor Ahmad Hasan Dani notes, “With this region Chitral has been historically associated until its separation by the British in 1895 for administrative convenience. It is usually believed that the region has been an appendix to Kashmir throughout history.”¹⁶⁴

Kashmir is actually a region apart. Ladakh separates Kashmir from Baltistan in the north albeit the fact that its boundaries adjoin Astore district of GB across the Shounter, Fulway and Kamri passes. Geographically and culturally speaking, Ladakh is a natural part of GB region. It remains cut off from the Indian Occupied Kashmir (IOK) for 5 to 6 months owing to closure of Zojila and other high mountain passes due to winter snowfall. However, throughout the year, it remains connected with Baltistan through the Shayok, Indus and Shingo rivers. Geographically, historically and culturally, Kohistan (Yaghestan, as called during the British era) has been part of GB. The British hardly had any authority therein. It was invaded and annexed by the rulers of Swat as confirmed by British letter of February 24, 1913 with consent of the British Empire.

GB has a territorial area of 72,496 square kilometres. Some 94 percent of GB’s area comprises high mountains and glaciers, 4 percent is covered with forest, 1.8 percent is cultivated and 0.2 percent comprises built up area. Another source shows forests as covering some 6,592 square kilometres in GB, which make up 9.1 percent of the region.¹⁶⁵ However, this seems to be a little exaggerated. Some 86 percent of the population is living in rural areas while the remaining 14 percent lives

¹⁶⁴ Dani, 2001, 5.

¹⁶⁵ Imran Sikandar Baloch.

in the major towns including Gilgit and Skardu. Literacy rate is nearly 50 percent. The GB region has unique geographic, ethnic and linguistic richness and diversity. Important facets of human geography and contextual makeup of GB are discussed herein.

Historical Perspective

The ancient history of the GB region is not found in the recorded form because of geographic remoteness and underdevelopment of the region. History contains different names for various parts of the region. Baltistan was once known as Pololo. Baltistan has also been known as Tibet Minor and the Tibet of Apricot. In some accounts, Baltistan has been referred to as the Large Pololo or Pololo Major and Gilgit as the Small Pololo or Pololo Minor. Baltistan was also known as Palore, which the Arabs later wrote as Balore and was also called as Baloritsan or Balawaristan. The sub-nationalist groups in GB still use the term Balawaristan as an independent state that GB should be turned into. Gilgit was also known as Sargin Gilgit meaning the happy land of Gilgit. During the British era, Kohistan was known as the Yaghestan. The area forming part of Gilgit and Diamer district today has also been referred to as Dardistan, the land of the Dard people, as termed by Dr Gottlieb Wilhelm Leitner and earlier by Ptolemy and Herodotus. Some accounts show that Hunza had been named as such because it was ruled by the Central Asia Huns for some time.

The history of the region can be divided into four different chronological phases: *First*, the Ancient Era i.e. BC era to 7th century; *Second*, the Medieval Era (including Arrival of Islam) i.e. 8th to 18th century; *Third*, the Dogra Rule 1840 to 1947-48; and *Fourth*, the Post-Liberation Period i.e. 1947 to date.

Phase-1: Ancient Era – BC Era to 7th Century

During the *Ancient Era*, the region remained under the mixed rule of the Chinese, Central Asia and Tibetan emperors, and the local rulers. Some parts of the region were also ruled by the Scythians, Parthians, Kashans and Huns during different times in history. The people in the Gilgit and Diamer regions were called Dard or Dardic. The traces and drawings of rocks also provide some information with regard to the religion, culture and societal ethos in the region. Actually, the traces of rocks can be termed as the books that the people of that era left for posterity to study their culture and habits. These rock-carvings suggest that the earliest human history in GB can be traced back to the 5th millennium BC.

Till 7th century AD, Buddhism was the main religion in the region, which had earlier replaced Bon-Chos that had actually existed in the entire trans-Himalayan region. The followers of the Bon-chos religion were called Bon-pos. Bon-chos has also been called Lha-chos i.e. the religion of the spirits (or gods). Under Bon-chos, the fulfilment of religious obligations for fertility, fecundity and plenitude involved certain mystical rituals including ritual dances similar to Taoism. Ibex, Swastika and Yoni have been the popular symbols of Bon-chos – ibex as a male creative principle and yoni as a female creative principle. It also included sacrifice of ibex and distribution of its meat among neighbours and relatives on the birth of a child. Bon-chos was a combination of animism, nature worship and demonolatry. The rock carvings of the Bon-chos era point to a culture ranging from totemic primitivism to a nomadic way of living. A number of rocks with the Bon-chos and Buddhist holy scripts were later razed during the Muslim era but many of them still exist in various districts of GB.¹⁶⁶ Later, during the Buddhist era, the ibex seems to have attained reverential status in the region.

Phase-1: The Medieval Era (including Arrival of Islam) i.e. 8th to 18th Century

Islam arrived in the north-western parts of GB in 725 AD from Badakhshan and Central Asia. The case of Baltistan sub-region was, however, different. The Tarakhans rulers of Gilgit are said to have embraced Islam in the 8th century when the Arab advance into Central Asia pushed the Turkish population of Badakhshan, Wakhan and Xinjiang into the region. However, in the Baltistan sub-region,

Figure-10: Amburiq Mosque in Shigar built in 14th Century.



Source: Photographed by the author on September 19, 2015.

Islam arrived in the region in 14th Century AD. *Inter alia*, Amir Kabir Syed Ali

¹⁶⁶ O. C. Handa, *Buddhist Western Himalaya: A politico-religious history* (New Delhi: Indus Publishing Company, 2001), 255-256.

Hamadani worked hard for the spread of Islam in the area and built a number of mosques. Figure-10 shows the image of Amburiq Mosque in Shigar built in 14th Century.

The *Medieval Era* saw the coming of the local dynasties. The region saw self-governing states of various sizes expanding and shrinking as a result of various events. As many as 17 states existed in GB during various periods, which included

Gilgit, Hunza, Nagar, Puniyal, Yasin, Ishkoman, Koh-e-Ghizer, Chilas, Darel-Tangir, Astore, Skardu, Kharmang, Tolti, Shigar, Roundo, Keris and Khaplu.

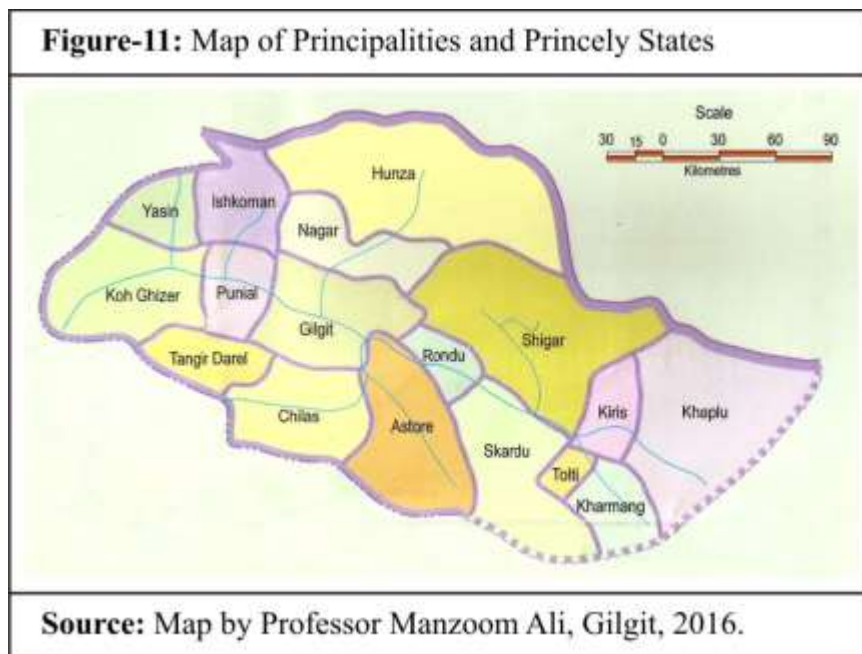


Figure-11

contains the map showing the 17 states.

Between the 7th and 19th centuries, the area was ruled by various local rajahs such as the Tarakhans in Gilgit state, Mehtar and Kator in the neighbouring Chitral state, Khushwaqt family in Yasin and Mastuj, Maghlots in Nagar state, Ayashoo and Mirs in Hunza state, Burshai in Puniyal state, Maqpoon in Skardu and Kharmang and Astore, Amacha in Shigar and Yebgo in Khaplu.¹⁶⁷ There were once seven tiny states in the Baltistan sub-region alone. Although the Mughals invaded Kashmir during Akbar's regime, GB largely remained free from their influence until the Dogra invasion.

The *Dogra Invasion* of GB and its inclusion into the Dogra state of Kashmir proceeded a little differently in various sub-regions of GB. It has a linkage with foundation of the Punjab Empire based on the Lahore Darbar by Ranjit Singh in 1799

¹⁶⁷ There were states in the adjoining regions too e.g. Dir, Swat, Chitral to the west, Yarkant to the north and Ladakh to the south.

after which he defeated Zaman Shah Durrani and ousted the Afghans from the Punjab.¹⁶⁸ The Sikh-Afghan contest continued.¹⁶⁹ Ranjit Singh conquered Kashmir in 1819. During this campaign, three Dogra siblings i.e. Gulab Singh, Suchet Singh and Dhian Singh took an active part. All three, including their father Kishore Singh, were already associated with the Lahore Darbar. As a reward, Ranjit Singh took Dhian Singh as a minister in his cabinet at Lahore. He also gifted the small state of Jammu to the Dogras to rule. Kishore Singh was the first ruler of Jammu and was replaced by his son Gulab Singh in 1821-22.

The state of Jammu was actually located within the Punjab. Ranjit Singh took Dhian Singh as a servant in the Lahore Darbar. With the consent from Ranjit Singh, Gulab Singh started conquering the territories in the north. He began with Riasi, Chamba and Kishtwar. The Dogras conquered Pureg (Kargil and Suru) in 1834, Ladakh (Leh and Zanskar) in 1835 and Baltistan in 1840.¹⁷⁰ Actually, Muhammad Shah son of Ahmed Shah, the Raja of Skardu had rebelled to Srinagar to seek the help of Dogra rulers against his father. His brother in law (Ahmed Shah's son-in-law) Ali Sher Khan, the Raja of Kharmang shared his feelings as he was also annoyed with his father-in-law Ahmed Shah. They had invited the Dogra rulers to invade GB. The Dogra forces led by Wazir Zorawar Singh attacked and capture Skardu and installed Muhammad Shah as Raja of Skardu replacing his father. Ahmed Shah later died in Dogra custody in 1845. It may be noted that the boundaries of the Dogra state of Jammu and Kashmir had expanded up to China while the Kashmir valley was still a part of the Sikh Empire of the Punjab. Kashmir's Governor was still being appointed by the Lahore Darbar.

¹⁶⁸ At its peak, the boundaries of the Sikh Empire reached Khyber Pass in the West, Karakoram in the north, the Western Tibet in the East and the boundaries of Sindh in the South (actually up to Mithankot, presently located in South Punjab). With its capital (Darbar) at Lahore, it had four provinces including Lahore, Multan, Kashmir and Peshawar. It lasted 50 years (1799 to 1849) during which it was ruled by six emperors including Ranjit Singh (1801-1839), Kharak Singh (1839), Nau Nihal Singh (1839-1840), Chand Kaur (1840-1841), Sher Singh (1841-1843) and Duleep Singh (1843-1849). Actually, the Sikh Empire comprised 80 percent Muslim population, 10 percent Sikh and 10 percent Hindu. Mulk Raj Anand, *Ranjit Singh: A Secular Sikh Sovereign* (New Delhi: Abhinav Publishers, 1989) contains a detailed perspective.

¹⁶⁹ Ranjit Singh even marched into Kabul with his troops to participate in the viceroy parade in 1838 after the re-installation of Shah Shuja.

¹⁷⁰ Earlier, there had been a number of small hill states north of Jammu such as Basohli, Kishtwar, Bhadrawah, Akhnur, Dalpatpur, Riasi, Bhoti, Bandralta, Chamba, Rajauri, Poonch and Samba. Some of these existed even at the time of Afghan invasion of the Punjab and Kashmir in 18th Century. Ahmed Ahmed Shah Durrani's forces were able to assimilate or bring under control most of them. Raj Kumar, *Paintings and Lifestyles of Jammu Region: From 17th to 19th Century A.D.* (New Delhi: Kalpaz Publications, 2006), 60.

Later, there was a local uprising in Baltistan in 1841 during which the Dogra Commander Bhagwan Singh was arrested from Skardu. This movement was led by Haider Khan of Shigar, Ali Khan of Roundo and Daulat Ali Khan from Khaplu.¹⁷¹ It was quelled in 1842 by a Dogra force commanded by Wazir Lakhpat Rai. Thenceforward, the Dogra rule in the region continued till 1948.

The case of Gilgit and surrounding areas was a little different. In 1842, Gilgit was being ruled by Sikandar Shah, a raja from Nagar. Raja Gohar Aman, the ruler of Yasin, attacked Gilgit, killed Sikandar Shah and captured Gilgit. Sikandar Shah's brother Karim Khan took refuge in the Lahore Darbar and sought help from Sikhs. The Lahore Darbar directed the Governor of Kashmir to help Karim Khan. They sent a Sikh force comprising 1,000 soldiers led by Colonel Nathu Shah. To this end, Dr Amar Singh Chohan wrote, 'A couple of Sikh regiments were sent under Nathu Shah, a Sayyid of Gujranwala, who was a capable commander and held the rank of a Colonel.'¹⁷² Dr Amar Singh goes on to note, 'Nathu Shah encountered Gaur Rehman [sic] at Basin, three miles higher up the valley, and defeated him. Gaur Rehman retired into Punial.'¹⁷³

The same year, another Dogra commander Mathra Das reached Gilgit to replace Colonel Nathu Shah. Mathra Das was attacked by Gohar Aman and badly defeated in the stony battlefield of Sharot and Gulpur. Dr Amar Singh notes, 'Mathra Das himself ran straight to Kashmir.'¹⁷⁴ However, Colonel Nathu did not give up. Gohar Aman, instead of fighting, embarked on negotiations as a result of which it was decided that '[the] Sikhs should hold Gilgit.'¹⁷⁵ The usual boundary of Gilgit west of the town was agreed upon. As a result, each of the three Rajas i.e. Raja Gohar Aman (the Raja of Yasin), Raja Jaffar Khan (the Raja of Nagar) and Raja Ghazan Khan (the Raja of Hunza) gave their daughters in marriage to Colonel Nathu Shah. Colonel Nathu Shah installed Karim Khan as the ruler of Gilgit. However, due to the fear of a comeback of Gohar Aman and his allies, they agreed on a sort of joint administration.

¹⁷¹ Haider Khan from Shigar was captured and imprisoned by the Dogras and later died in their captivity.

¹⁷² Dr Amar Singh Chohan, *The Gilgit Agency 1877-1935* (New Delhi: Atlantic Publishers and Distributors, 1985), 6.

¹⁷³ Ibid.

¹⁷⁴ Ibid.

¹⁷⁵ Ibid.

Some Sikh troops under a Thanadar were also stationed at Gilgit. Thus, Gilgit came under direct influence of the Sikh Empire of Punjab.

Later, the First Anglo-Sikh War broke out between the British East India Company (EIC) and the Sikh Empire of the Punjab in 1845. After defeat of the Sikhs in this war, the Treaty of Lahore was concluded between EIC and the Sikh Empire on March 9, 1846 under which Sikhs lost the larger part of their territory, including Gilgit. A week later, the Treaty of Amritsar was concluded on March 16, 1846 between the British Indian Government and Gulab Singh Dogra of Kashmir state. In accordance with the provisions of this treaty, British sold the parts of Kashmir captured from the Sikh rulers of the Punjab to the Dogra rulers of Kashmir for 7,500,000 Nanakshahi (the Sikh currency). The territory that was sold also included the parts of GB captured by the Sikhs 1842 onward.¹⁷⁶ On this, Pandit Prem Nath Bazaz Justice is quoted to have commented: “Two million people in the valley and Gilgit were sold like sheep and cattle.”¹⁷⁷ Some other scholars said that the ‘paradise of Kashmir was sold for 7.5 million Nanakshahi. At any rate, it was historically unparalleled illicit civilizational trade between two invaders who chose to sell and buy human flesh, honour and ethos at large in addition to the geographical area extending from Little Pamir to Himalayas.

On this, Allama Dr Muhammad Iqbal, an Indian Muslim philosopher and poet who had belonged to the Kashmiri lineage, said:

دبقان و کشت و جُوئے و خیابان فروختند
قومے فروختند و چه ارزاں فروختند

The peasants, the land and the orchard were sold
A nation was sold, and (oddly) how cheap it was sold!

After the transfer of Kashmir and Gilgit etc to Dogras in 1846, Colonel Nathu Shah shifted his services from the Sikhs to the Dogras along with most of his 100 Sikh soldiers stationed at Gilgit. The Dogra military posts in Gilgit and Astore were replaced with Dogra soldiers and flag. In 1847, a British commission led by two

¹⁷⁶ The treaty was written in Persian, which was the official language of the Lahore Darbar of the Sikh Empire of the Punjab. It was decided that Dogras will right away deposit 5 million Nanakshahi while the remaining 2.5 million Nanakshahi will be deposited on or before October 1, 1846. According to some authors, the average price amounted to 7 Nanakshahi per Kashmiri.

¹⁷⁷ Quoted in Justice (Retired) Muhammad Yousaf Saraf, *Kashmiris Fight for Freedom*, Vol 1 (Mirpur: National Institute of Kashmir Studies, 2015), 206.

military officers Captain Younghusband and Lieutenant Angew reached Gilgit to oversee the boundary issues and make any decision if needed. Dogras had directed Nathu Shah to facilitate their trip. The British officers wanted to visit Hunza but Raja Ghazan Khan, the Raja of Hunza, refused. He blamed Nathu Shah for having allowed the foreigners to visit the areas and in fury attacked and looted five villages of Gilgit. To avenge the exploit of Raja Ghazan Khan, Colonel Nathu Shah attacked Hunza but his entire force was annihilated. He himself was killed during this operation along with Raja Karim Khan of Gilgit. Raja Muhammad Khan II succeeded Raja Karim Khan. The tussle continued. Gohar Aman, the Raja of Yasin and Puniyal along with the people from Darel partnered against Dogra forces. There was also an uprising in Darel and Chilas areas. According to Hashmatullah Khan, the author of *Tareekh-e-Jammu* (literally the History of Jammu), as cited by Dr Amar Singh Chohan, 'Hostilities were not however, confined to Chilas. In Gilgit also, trouble soon broke out, which caused the Maharaja to lose all Dardistan that he possessed on the right bank of the Indus.'¹⁷⁸

Dogra forces captured Chilas in 1852 at a cost of lives of 1,500 soldiers and Darel in 1856. A great battle was fought on the bank of the Gilgit River between the Dogra forces led by Bhup Singh, the Dogra commandant for reserves at Bunji and Astore, and Raja Gohar Aman who was supported by his allies from Hunza. The Dards trapped the Dogra forces and kept them without food for seven days. By the end of the battle, about 1,000 Dogra soldiers were killed, and according to Frederic Drew 'a hundred or two were taken prisoners and sold into slavery.'¹⁷⁹ In Gilgit Fort and the neighbouring Naupur garrison, the fate of Dogra soldiers was no different. All Gurkha troops stationed there were killed along with their families, which they often used to keep with them on service, except one of the women who jumped into Gilgit River, swam across it as well as the Indus River, and reached Bunji. It is said that she swam across holding the tail of a cow.¹⁸⁰

On re-capture of Gilgit by Raja Gohar Aman, Raja Muhammad Khan II of Gilgit was ousted. He took refuge in Kashmir. As a matter of fact, Dogras had been

¹⁷⁸ Maulvi Hashmatullah Khan quoted in Chohan, 1985, 9.

¹⁷⁹ Frederic Drew, *The Northern Barrier of India* quoted in Chohan, 1985, 9.

¹⁸⁰ She was given a pension by the Maharaja for her meritorious service for the state. Maulvi Hashmatullah Khan, 738.

virtually driven out of the entire Dardistan west of the Indus River.¹⁸¹ The Dogra boundary remained at the Indus west of Haramosh. However, they had a firm hold over Baltistan sub-region.

Maharaja Gulab Singh's health was gradually falling. He died in 1857. His successor Ranbir Singh was committed in the issues relating to the Indian War of Independence 1857 (the Indian Mutiny as the British preferred to call it). In 1860, Dogras made a comeback in Gilgit. A force led by Colonel (later General) Devi Singh Narainia marched into Gilgit and advanced on Gohar Aman's fort. Gohar Aman's natural death coincided with the Dogra invasion in 1860. Dogras went on. After re-conquering Gilgit, they captured Puniyal and Yasin. They installed Raja Gohar Aman's cousin Azmat Shah as the ruler of Yasin (soon expelled by the people) and Esau Bahadur as the ruler of Puniyal (an arrangement which endured) and fell back to Gilgit.

They replaced Raja Gohar Aman with Raja Karim Khan as the ruler of Gilgit. He was son of Raja Muhammad Khan II. Hunza state practically remained out of the control of Dogra rule till conquered in 1891 by force of arms.¹⁸² Gilgit and Baltistan were brought together as a single administrative unit in 1889. Later, it was divided into Gilgit wazarat and Ladakh wazarat in 1892. The first British political agent was appointed at Chilas in 1892 with Darel and Tangir under his jurisdiction. Astore and Haramosh were earlier made part of Baltistan but later merged with Gilgit Agency. Yasin, Ishkoman and Koh-e-Ghizer were merged with Gilgit Agency in 1895.

Baltistan remained part of the Dogra regime from 1840 to 1948 (108 years) with an uprising in 1842, mentioned above, suppressed by Dogra forces through military means. Gilgit and surrounding areas remained under the Dogra regime from 1846 to 1947 with some pauses, ruptures, turbulences and local insubordination. Viewed on a larger map and on a purely political note, the Dogra regime gave shape to a region to GB roughly about what it can be seen today despite sectarian, linguistic, ethnic and geographical differences and fragmentation between the communities dwelling therein.

¹⁸¹ Frederic Drew, *The Northern Barrier of India: A popular account of the Jummoo and Kashmir territories, etc.* Originally published in 1877 (Boston: Adamant Media Corporation: 1877), 443.

¹⁸² Actually, Mir Safdar Khan of Hunza warmed towards Russians and blocked the British route to China via Hunza. This alarmed the British. A joint military operation by the British and Dogras attacked and defeated the forces of Hunza and Nagar in 1891. Mir Safdar Khan escaped to China.

There are a few contending points of view with regard to which areas of GB were part of the Treaty of Amritsar 1846 under which the British sold them ‘all the hilly or mountainous country with its dependencies situated to the eastward of the River Indus and the westward of the River Ravi’ for 7.5 million Nanakshahi as discussed earlier. Scholars from Baltistan region, notably Muhammad Yousaf Hussainabadi, Muhammad Hassan Hasrat and Muhammad Qasim Naseem maintain that since Baltistan had already been captured by Dogras through military aggression, therefore it was not part of the 7.5 million Nanakshahi ‘deal’ between the British and the Dogras. Muhammad Yousaf Hussainabadi believes that ‘It did not make any sense for the Dogras to have purchased the territory that they had already occupied by force of arms.’ On the other hand, some scholars from Gilgit maintain that since ‘Gilgit is located west of Indus, therefore it was not part of the 7.5 million Nanakshahi “trade off”.’

For instance, Brigadier Hisamullah Baig, *et al*, have noted, ‘This record clears the fact that Chilas, Hunza, Nagar and other areas to north of these were not given to the Maharaja by terms of Treaty of Amritsar.’¹⁸³ However, Professor Usman Ali upholds that Gilgit, not Baltistan, was part of the 7.5 million Nanakshahi deal. Colonel Imtiaz ul Haq, in a research thesis, quoted Professor Ahmed Hassan Dani as stating that ‘the areas of Chilas, Gilgit, Hunza, Nagar and all other areas falling north and west of Indus River never formed part of treaty.’¹⁸⁴ Colonel Imtiaz has also given a map in his thesis showing that only Chilas, Astore and Skardu fell on the east of Indus River.

On the other hand, Dr Amar Singh Chohan maintains that ‘Kashmir, and with it Gilgit, [was] ceded to Gulab Singh in 1846.’¹⁸⁵ He also noted that ‘the Dogra troops relieved the Sikh posts at Astore and Gilgit.’¹⁸⁶ Colonel Imtiaz is right if we strictly go by the language of the script of the Treaty of Amritsar 1846. But as a matter of fact, ‘east’ of Indus River applied to the lower elevations. In case of GB, Baltistan

¹⁸³ Hisamullah Baig, et al, “Historical Perspective of Gilgit-Baltistan,” Report compiled by a panel of seven members vide Chief Secretary Gilgit Baltistan’s Office Memorandum dated November 21, 2015, Gilgit (December 2015): 12.

¹⁸⁴ Dr Ahmad Hassan Dani quoted in Imtiaz ul Haq, “Determining the Political Status of Gilgit-Baltistan: Future Perspective,” A thesis submitted to *National University of Modern Languages*, Islamabad (April 2012), 64.

¹⁸⁵ Chohan, 1985, 7.

¹⁸⁶ *Ibid*.

was already part of Dogra regime; Gilgit and Astore were part of the 7.5 million Nanakshahi 'trade off' between the British and Dogras, and the remaining areas i.e. Chilas, Hunza, Nagar and Ghizer including Yasin and Puniyal, were captured or brought under influence by Dogras later in different stages.

History certainly serves as a guide for the future but it should not become an impediment to decide the political future of a region. We must take note of the fact that the Sikh Empire (*Sarkar-e-Khalsa*) of the Punjab was established in 1799 and dissolved in 1849 after defeat in the second Anglo-Sikh War 1848-49. The British left the Subcontinent in 1947. The Dogra state of Jammu and Kashmir disintegrated in 1947 and was officially abolished in 1952. The small princely states vanished into oblivion under the dust of history. None of them remains in GB today. The fact remains that the people of Gilgit had liberated themselves by November 1, 1947, and the people of Baltistan by August 14, 1948. Today, only the people of GB live in GB. Their future is linked with Pakistan and the future of Pakistan.

This points needs to be understood both by the leadership of GB and Pakistan at large. Both owe allegiance to the people of GB, who are waiting for proper constitutional status, national identity and improvement of human security conditions in accordance with the possibilities in 21st century. Both need to understand that social space of GB is transforming fast, the leadership is gradually coming into the hands of youth and there is a great awakening among the people at large with regard to their fundamental rights and liberties. Their opinion matters. Conception of future is more important than the contention of history.

It may be seen that history in GB evolved within the geographical compulsions and limitations. The Dogras invaded Baltistan in 1840 as a natural geographical choice after Purg in 1834 and Ladakh in 1835. Likewise, after having conquered Gilgit in 1842, the Sikh force commander Colonel Nathu Shah came into geographical contact with the states of Hunza, Nagar, Puniyal and Yasin, and was thus able to engage them both militarily and diplomatically. The Russian and Chinese influence in Hunza and the British endeavour to check Russian efforts were also actuated and necessitated by geographical proximity. So, geo-humanism played its role in GB throughout the history of the region.

Establishment of Gilgit Agency

To check the influence and expansion of Czarist Russia in GB, especially the neighbouring Hunza state, Gilgit Agency was established by the British Indian

Government in 1877 (by Major John Biddulph), was abolished in 1881 and re-established in 1889. The British Empire acquired Gilgit Agency on lease for 60 years from the Kashmir State in 1935 under a one-page agreement containing five articles between the British Indian government and Maharaja of Kashmir. Actually, the British wanted to keep an eye on the Kremlin interests in the region following the 1917 Bolshevik Revolution.

Gilgit Scouts comprising local youth were employed on the passing linking GB and the Wakhan Corridor or, distantly so, Russian Empire. Thus, Gilgit Agency generally became part of the 19th century Great Game between the British Empire and the Russian Empire. With regard to the composition of the agency, the Resident of Kashmir wrote a letter bearing number Y 103/27 dated 12 January 1924 to Colonel G.P. Gunter Director Frontier Circles, Survey of India stating that territory of Gilgit Agency was divided into three categories: (1) Kashmir State Territory i.e. Gilgit tehsil, including Bunji and Astore; (2). Political Districts i.e. Hunza, Nagar, Puniyal, Koh-e- Ghizer, Ishkoman and Chilas; and Un-administered Areas to Darel, Tangir, Kandia, Jalkot, Sazin, Shatial and Herbun.¹⁸⁷

The British Colonel Algernon Durand established Gilgit Levies in 1889. It was raised to guard against the external threat emanating from the Czarist Russia and internal threats that may rise in the shape of rebellions led by the local chieftains. The British established Gilgit Levies, which fought during the Anglo-Brushak War in the battlefield of Nilt in the state of Nagar in 1891. Later, it was re-designated Gilgit Scouts in 1913 after reorganization into companies under Major J.C. Bridges. It had a total of 582 personnel, who were 100 percent Muslim. Enrolment in Gilgit Scouts used be on the recommendation of local Mirs and Rajas. Their own family members were often given Viceregal commission. The Gilgit Scouts led by British Major W. A. Brown also took part in the Liberation War in 1947.

After the creation of Pakistan, Gilgit Scouts were placed under the command of Major Muhammad Tufail Shaheed. The Gilgit Scouts were re-designated Northern Scouts in November 1949, and Karakoram Scouts on January 1, 1964 after bifurcation. The headquarters of Karakoram Scouts was based in Skardu. On November 1, 1975, all paramilitary troops were amalgamated with the newly formed Northern Light Infantry (NLI), which had 10 battalions, 3 mountain batteries and a

¹⁸⁷ Hisamullah Baig, et al: vii.

regimental centre. The Gilgit Scouts were converted into 1st and 2nd Battalions of the Northern Light Infantry. They adopted the mottos of Victors and Liberators respectively with reference to their role in the Liberation War wherein Gilgit Scouts claimed to have captured Kargil and Batalik in 1948. After 1999 Kargil War, the Northern Light Infantry was converted into a regular regiment on a par with other infantry regiments of Pakistan Army.

Wakhan Corridor was carved out of the Hunza state with a part of Pamir by the British and merged with Afghanistan as a buffer between the British Empire and the Russian Empire. In return, Hunza was offered two villages of Gilgit, namely Matumdas and Oshkhandan.¹⁸⁸

According to Mr Bercha, “More than the internal affairs of Gilgit Agency, the British political agent was concerned about watching over the passes linking China, Russia and Afghanistan. They told Dogras to continue with the state affairs and that the British will not disturb their routine internal administration, and will rather keep an eye on the external threat especially from Russia.”¹⁸⁹ Hence, while the human security affairs of GB, especially the Gilgit Agency, were left to the Dogras, the state security issues were kept by the British with themselves.

This state-human security relationship, a sort of separation of power, had its own kind of effect on the state of human security. This kept the internal conflict dynamics simmering, and exploded them in Gilgit in 1947 immediately after the creation of Pakistan. During the coming months, the wave of liberation from the Dogra regime spread to Hunza, Nagar, Yasin, Darel, Tangir, Roundo, Shigar, Khaplu and Kharmang, and came to an end with replacement of the Dogra flag with Pakistan’s national flag on August 14, 1948.

The Liberation War, 1947-48

The British terminated the lease of Gilgit Agency on 1 August 1947, half a month before the independence of Pakistan and India. At this point in time, the freedom movement of the Indian Muslims in the Subcontinent was at its peak. The territorial rearrangement had already been decided. In case of GB, the region lacked two important facets: *First*, because of the rule of Rajas and Mirs etc, there was no political party to steer the people of the region into a desired political direction; and

¹⁸⁸ Cited in Hisamullah Baig, et al: vii.

¹⁸⁹ Bercha, 2015.

Second, due to geographic remoteness and thus isolation, the flow of information into this region was very slow. Yet, the people of the region wanted to join Pakistan due to religious fraternity. They wanted to throw the shackles of the Dogra rule as soon as possible.

The Gilgit Scouts comprising the local Muslims were the main British security force at Gilgit. They were led by Major Brown. On the other hand, 6th Jammu and Kashmir Rifles Battalion located at Bunji was an admixture of Muslims, Dogras and Sikhs. Both the Gilgit Scouts and the Muslim segment of 6th J&K Rifle Battalion rebelled. The Gilgit Scouts arrested Brigadier Ghansara Singh, the Dogra Governor, on the night of October 31 / November 1, 1947 and announced the liberation of Gilgit. A revolutionary government in Gilgit was instituted at Gilgit with Shah Rais, the Raja of Gilgit, as the president. The other important posts of the government were as follows: Colonel Mirza Hasan Khan as the Head of Military Affairs and Leader of Revolutionary Movement, Captain Durrani as Deputy Leader, Lieutenant Ghulam Haider as Political Agent, Subedar Major Babar Khan as Quarter Master, Raja Sultan Hameed as Police Chief and Major Brown as advisor. The government of Pakistan was requested through a wireless message to take over the political and administrative control of the region. On the ensuing events, Major Brown, the head of Gilgit Scouts notes:¹⁹⁰

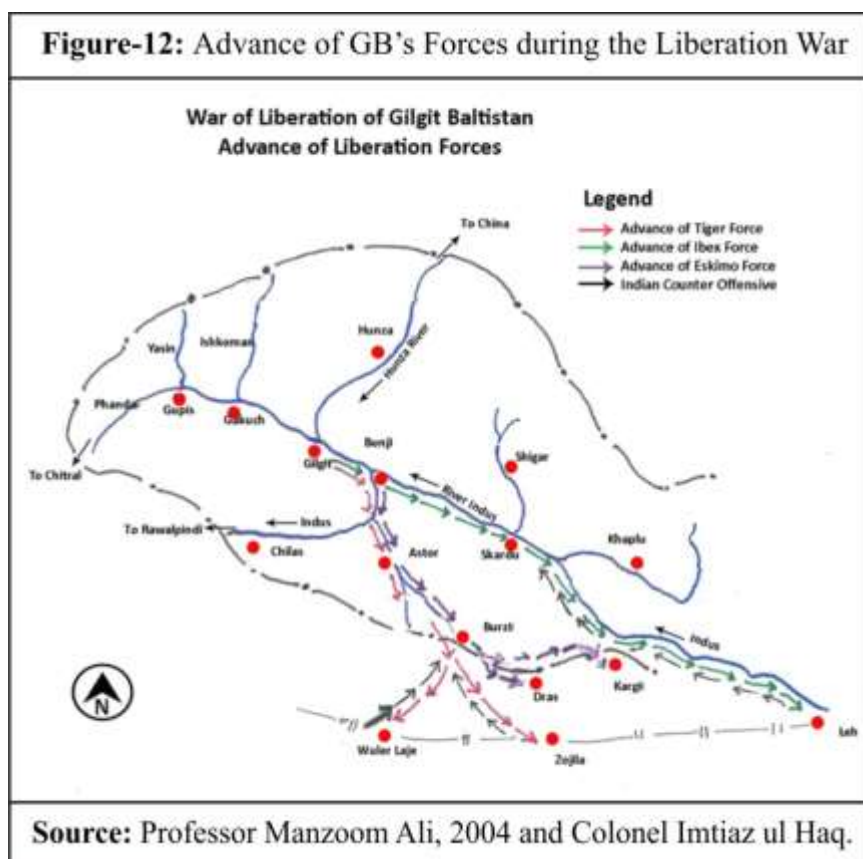
On 16th November, 1947, Sardar Mohammad Alam arrived in Gilgit bearing letter from the Pakistan Government to the effect that he had been appointed Political Agent of the Gilgit Agency. He was given an enthusiastic welcome by the local population and escorted in triumph to the Agency House. On 17th November at 9.30 am, the Pakistan flag was hoisted on the flag pole at the Agency House whilst a guard of honour from Gilgit Scouts paid full honours and the pipes and drums played the Royal Salute.

Major Brown also notes that there was a lot of festivity among locals on the arrival of Sardar Mohammad Alam Khan. However, differences did arise between him and some members of the provisional revolutionary government members.

The Dogra and Sikh soldiers of 6th J&K Battalion absconded on November 3, 1947. Three geographic lines of operation were adopted by the Liberation Force, which included the Gilgit Scouts, troops from 6th J&K Battalion and volunteers from different areas, as follows: (1) the Tiger Force led by Colonel Mirza Hassan Khan advanced along line Bunji – Astore – Zojila Pass; (2) the Eskimo Force led by Group Captain Shah Khan advanced along Axis Bunji – Astore – Chilam/ Deosai Plains –

¹⁹⁰ William A. Brown, *Gilgit Rebellion: The Major Who Mutinied Over Partition of India* (London: Pen and Sword, 2014), 263.

Burzil Pass – Dras – Kargil: and the Ibex Force led by Colonel Ehsan Ali advanced along the Indus River through Roundo and Skardu valleys. Figure-12 contains the map of the Liberation War.¹⁹¹ The force liberated the area up to Line Leh – Kargil – Dras – Padum – Zojila by the mid of the year 1948.



There were a number of other voluntary participants in the Liberation War. Forces from Chitral led by Colonel Matta ul Mulk and Major Ghulam Mohiudin also participated in the Liberation War in GB. In addition to volunteers, they included some personnel from the Chitral Scouts and Chitral Bodyguards, who participated in the liberation up to Baltistan and Nubra in Ladakh. Colonel Burhan ul Din from Chitral also participated in the war in Neelum Valley in Kashmir.

Some accounts have recorded that the Mirs of Hunza and Nagar were opposed to the Liberation War in Gilgit and called it a 'foolish drama'. Their antagonism increased after elevation of Shah Rais, the Raja of Gilgit, as the president of the revolutionary government in Gilgit. On the other hand, Colonel Mirza Hassan Khan calls the Hunza's and Nagar's letters for accession with Pakistan as the 'accession

¹⁹¹ Basic map by Professor (Emeritus) Manzooom Ali. Movement of forces illustrated by Colonel Imtiaz ul Haq: 114.

drama’.” A UN-negotiated ceasefire came into effect at 11:59 pm on 1 January 1949 along the entire line of contact of forces from both sides in GB and Kashmir.

Administrative Structure

GB is administratively divided into three divisions to include Gilgit, Diamer and Baltistan and ten districts to include Gilgit, Ghizer, Hunza and Nagar districts in Gilgit Division, Diamer and Astore districts in Diamer division and Skardu, Shigar, Ghanche and Kharmang in Baltistan division. Each district is further divided into tehsils and subdivisions. The region has territorial area of 72,496 square kilometres and a population of 1.249 million (2016 estimates).¹⁹²

Sectarian Profile

GB is an mixture of four main sects include *Sunni*, *Shia*, *Ismaili* and *Noorbakhshi*. The *Noorbakhshi* community has two sub-sects *Sofia Noorbakhshia* and *Imamia Noorbakhshia*. The Ahle Hadith community is often counted as part of the Sunni population. Details are shown in Table 4.1.¹⁹³

| District | Population (Million) | Sect Percentage | | | |
|--------------|----------------------|-----------------|-----------|-----------|-------------|
| | | Sunni | Shia | Ismaili | Noorbakhshi |
| Gilgit | 0.196 | 35 | 45 | 19.5 | 0.5 |
| Skardu | 0.289 | 6 | 88 | - | 6 |
| Diamer | 0.177 | 100 | - | - | - |
| Ghizer | 0.162 | 10 | 5 | 85 | - |
| Ghanche | 0.199 | 23 | 2 | - | 75 |
| Astore | 0.096 | 70 | 30 | - | - |
| Hunza-Nagar | 0.130 | - | 55 | 45 | - |
| Total | 1.249 | 28 | 41 | 20 | 11 |

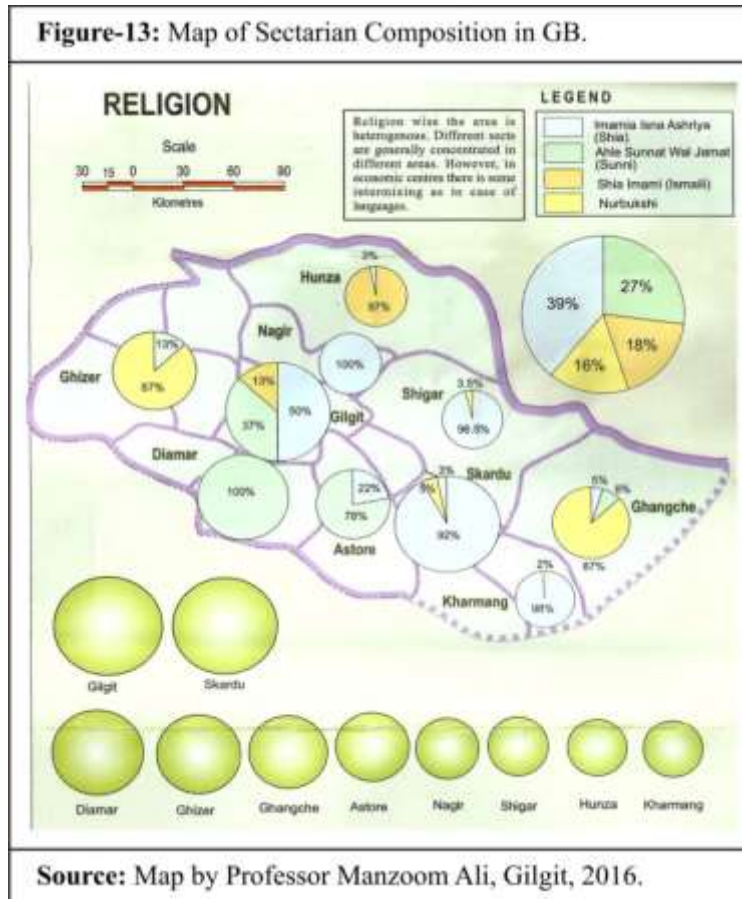
Source: Official Website of Gilgit-Baltistan Scouts.

The religious composition is a cause of sectarian tension and even violence. The origin of sectarianism in GB can be traced back to 1979, the year that marked two important events in the region: the Islamic Revolution in Iran and the Soviet Invasion of Afghanistan. Both these events increased sectarian tension in Pakistan, including

¹⁹² According to the 1998 census, the population of GB was 0.98 million.

¹⁹³ “Population/ Sectarian Profile,” *Gilgit-Baltistan Scouts*, <http://www.gilgitbaltistanscouts.gov.pk/geodemo.htm> (accessed March 10, 2016).

GB. The worst ever sectarian event occurred in 1988 when a number of Sunnis and Shia were killed in Gilgit and surrounding areas. The effects of the 1988 incidents can be felt across the social space of GB even today. The map by Professor Manzoom Ali, given in Figure-13, shows the sectarian composition as: Shia 39 percent, Sunni, 27 percent, Ismaili, 18 percent and Noorbakhshi 16 percent.



Almost all districts and towns of GB have a clear cut majority of one sect or the other. However, the case of Gilgit is different wherein Shia, Sunni and Ismaili are dwelling in the town in good number. Therefore, sectarian tension in Gilgit is more than in any other area. Shia and Sunni compete with each other in various spheres of human life e.g. religious, social, cultural, political and economic. It would not be wholly wrong to say that they have separate economies. There are separate shops for Shia and Sunni. They have separate cobblers, barbers and slaughterers. Some time back, even public transport had been separated. According to a Sunni scholar from Gilgit, it was started by Sunni community by having community exclusive slaughterers. The Shia followed suit later in retaliation. Slaughterers, cobblers, barbers in Gilgit came from other areas. Some 99 percent cobblers came from Bajaur Agency of FATA. The others are

from the Punjab. Most of the barbers in Gilgit – about 80 to 90 percent – are from Hazara. Many of them are from Mansehra area. In Skardu, most of the barbers and cobblers are from Punjab or KPK. There is only one barber shop at Skardu owned by a Balti.

Linguistic Makeup

Language is not only a means of communication but also medium of identity. Clare F. O’Leary notes, ‘GB is one of the most multilingual places on the face of the earth’.¹⁹⁴ To this end, Dr. Ghulam Hyder Sindhi notes, ‘The unmistakable imprint of Tibeto-Burman languages, the Iranian languages, the Indo-European family and the Indo-Aryan family testify to the fact that the northern areas [Gilgit-Baltistan] of Pakistan serve as a bridge between South Asia, Central Asia, China, and Iran.’¹⁹⁵

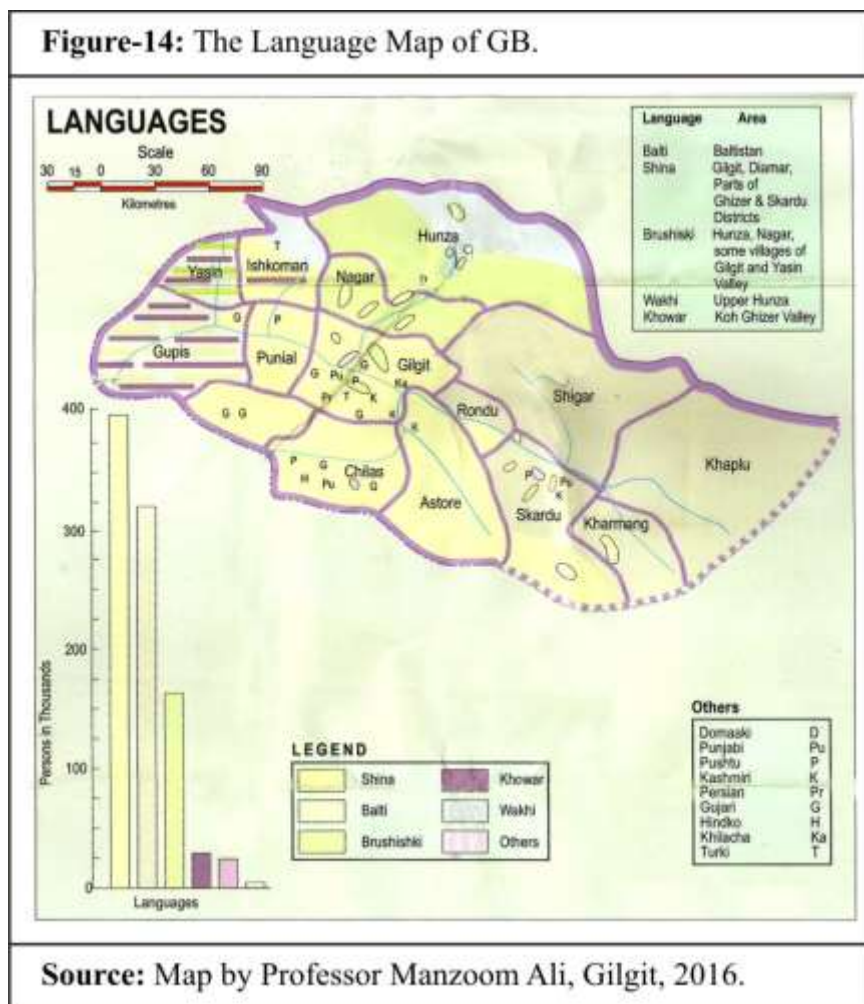
Seven major languages are spoken in GB: (1) *Shina* is spoken in Gilgit, Ghizer, Diamer, Astore, Hunza and Nagar; (2) *Balti* is the language of Baltistan division, which consists of Skardu, Shigar, Kharmang and Ghanche districts; (3) *Burushaski* is still an unwritten language. It is primarily spoken in Hunza and Nagar districts and some villages of Ghizer and Gilgit district; (4) *Khowar* is primarily the language of the Chitral region of Khyber-Pakhtunkhwa province. However, due to geographic contiguity, historical linkages and matrimonial relations between the people of Chitral and Ghizer, it is also spoken in the Western part of Ghizer district also, especially Yasin and Phander valleys. It is also spoken by the Ghizeri settlers in Gilgit; (5) *Wakhi* is the language of Upper Hunza (Gojal, Passu, Shimshal and Chipurson valleys). It is also spoken in Ishkoman valley of Ghizer district. It is spoken by about 3,000 people. It is the Pamiri dialect of the pan-Persian languages; (6) *Domaaki* is the language of Domas of Berichos who live in Gilgit, Hunza and Baltistan. They are musicians and smiths by profession. They also speak the languages of the areas they live in e.g. Shina and Balti; and (7) Gojri is the language of Gojar families settled in the Naltar and Kargah valleys of Gilgit and the nomadic people of Kashmiri and Hazara origin who visit GB, especially the Deosai Plains, for cattle breeding and sheep-rearing during summer.¹⁹⁶

¹⁹⁴ Clare F. O’Leary in Introduction to Peter C. Backstrom and Carla F. Radloff, *Sociolinguistic Survey of Northern Pakistan: Vol 2, Languages of Northern Areas* (Islamabad: National Institute of Pakistani Studies, Quaid-i-Azam University, 2002), 9.

¹⁹⁵ In preface to Backstrom and Radloff, 9.

¹⁹⁶ “Languages,” *Gilgit-Baltistan Scouts*, <http://www.gilgitbaltistanscouts.gov.pk/geodemo.htm> (accessed March 10, 2016).

Shina belongs to the Indo-Aryan group of languages, *Balti* belongs to the Tibeto-Burman group of languages, *Khowar* belongs to the Chitrali group of languages, *Wakhi* belongs to the Persian-Pamiri group of languages, and Burushaski is the isolated group according to Backstrom and Radloff.¹⁹⁷ A few people also speak Punjabi and Pashto. However, Urdu is the *lingua franca* of the region. People from Gilgit and Baltistan speak to each other in Urdu because their native languages are Shina and Balti respectively, which are as different as are Punjabi and Pashto. Even the people from lower Hunza and Upper Hunza communicate with each other in Urdu as their native languages are Burushaski and Wakhi respectively, not understood mutually. Figure-14 contains the language map of GB.



Notwithstanding the above, Urdu is the *lingua franca* for people hailing from different areas of GB. A Gilgiti needs to converse with a Balti in Urdu, a Brusho needs to communicate with a Wakhi in Urdu, and so on. According to Mr Sher Baz

¹⁹⁷ Backstrom and Radloff, xvi.

Ali Bercha, ‘The Urdu language existed in GB before 1947 but it was called Hindustani by the British officials and Supia by the locals’.¹⁹⁸ That Urdu existed in GB before 1947 was also part of a general cultural evolution, with the insertion of various strands from the adjoining geographical regions. In this case, it was the influence of Dogra rulers, their officials, the British officials and their Indian companions, and the traders etc from the areas forming part of today’s Pakistan. To this end, Dr Haji Karim Khan from Karakoram International University (KIU) said, ‘Militaries around the world have a role in language development. Urdu is one such example: the *Lashkari* language (the language of military). The Pakistan Army has a great role in linguistic development. People from various linguistic divisions of the country are serving together. Because of deep interaction, Punjabis can speak Pashto, Gilgitis can speak Punjabi, Baltis can speak Shina and so on.’¹⁹⁹

Ethnic Profile

Eight major ethnic groups inhabit GB. Table 4.2 shows the details.²⁰⁰

| Tribe | District-wise Population Percentage | | | | | | |
|------------------|-------------------------------------|--------|--------|--------|---------|--------|-------------|
| | Gilgit | Skardu | Diamer | Ghizer | Ghanche | Astore | Hunza-Nagar |
| Yashkun | 50 | - | 15 | 85 | - | 53 | 50 |
| Sheen | 30 | 15 | 40 | - | - | 70 | 30 |
| Moghals | 10 | - | - | - | - | 4 | 10 |
| Wakhi | 3 | - | - | - | - | - | 3 |
| Gujar | 2 | - | - | - | - | - | 2 |
| Balti | - | 75 | - | - | 90 | - | - |
| Kashmiri, Saadat | - | 10 | - | 3 | - | - | - |
| Others | 5 | - | 45 | 12 | 10 | - | 5 |

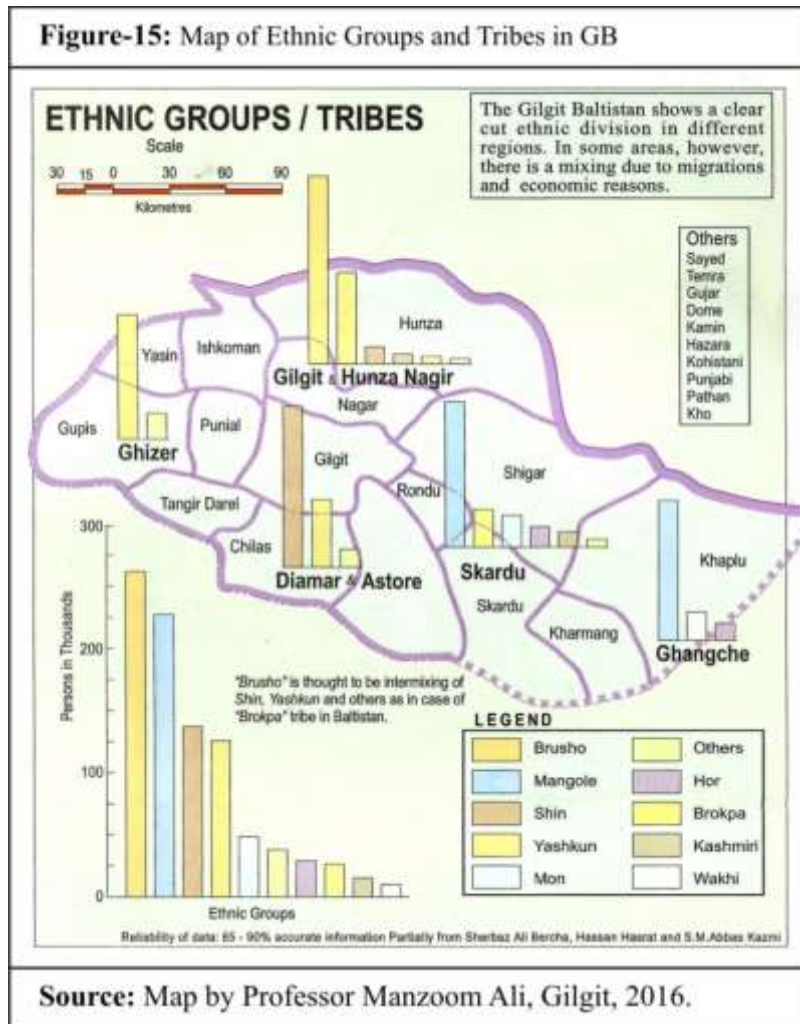
Source: Official Website of Gilgit-Baltistan Scouts.

Figure-15 shows the map of ethnic and tribal makeup in GB.

¹⁹⁸ Bercha, 2015. Supia means the language of Sepoys (soldiers). Urdu is literally understood as the language of “military camps.” It is national language of Pakistan, the *lingua franca* of all parts and provinces of Pakistan, and the official language of six Indian states. A significant part of Urdu is amixture of Arabic, Persian and Turkish languages.

¹⁹⁹ Dr Haji Karim Khan, Assistant Professor and Academic Coordinator, Karakoram International University (KIU), Skardu Campus. Interview by author, Skardu, March 31, 2016. Dr Karim hails from Yasin valley of Ghizer.

²⁰⁰ “Tribes,” *Gilgit-Baltistan Scouts*, <http://www.gilgitbaltistanscouts.gov.pk/geodemo.htm> (accessed March 10, 2016).



Sheens actually belong to Diamer and Gilgit areas. From Gilgit, they travelled to Ghizer, Hunza and Astore, and some of them settled therein alongside Yashkun. Baltistan is home of the Balti people. Mughal and Wakhi live in Hunza, Ishkoman and Yasin areas. Kashmiri and Pathan are living a minority groups in some parts of Skardu, Astore, Diamer and Gilgit. Sheen are also settled in Baltistan. There are two versions on why they settled therein. Sheens believe that since they are good fighters, they were settled in the valleys centuries ago by the local Balti rulers to guard against invasion by outside forces. Some Baltis think that they were brought by the Balti ruler Sher Ali Khan Anchen from the invaded Dard areas and settled in Baltistan for labour purposes. Whatever the reason, three factors must be kept in mind with regard to the Sheen community in Baltistan: first, they are still maintaining their Shina language and a homogeneous subculture; second, they support each other as a close-knit ethno-linguistic community; and third, they are a vibrant, energetic and dynamic

community. The Shina community has produced a number of trekkers, mountaineers, journalists and other constructive members of the Pakistani society.

Ethnic diversity in GB is also a source of discord, friction, competition and contention. The Gilgiti-Balti gulf is quite wide and deep. To this end, a scholar from Baltistan has said, ‘Gilgiti people do everything to hurt the Baltis i.e. they are unjust towards Baltis. The Gilgiti from all sects and ethnicities and linguistic groups are together in their antagonism towards Baltis.’²⁰¹ This issue was discussed with a scholar from Gilgit. According to him, ‘It is 100 percent biased opinion. It is rather other way round. Baltis calls Gilgiti *Brokpa* meaning wild. Balti community does everything to harm Gilgiti people. There is a perception that Balti would take out and eat the heart of a Gilgiti and would sit so calm as if he had done nothing.’²⁰² He went on to say, ‘In Gilgit, there is a proverb in Shina language: *Khudas neenayee par dunatar ga nay pasharot*, which means May God not bring us with them [Baltis] even in the life hereafter. You interview a hundred people in Gilgit; they would say that Balti are biased towards Gilgiti.’

He also said that sect is heavier than linguistic aspect in Gilgit but linguistic aspect overshadows sectarian aspect in Baltistan. In this regard, the views of Professor Usman Ali from Gilgit is rather balanced, ‘The people of Gilgit committed some mistakes vis-à-vis Baltistan. Gilgit was the centre of politics and governance. Baltistan remained a little backwards. This created some tension, which continues to date. It is gradually waning but sectarianism is the biggest issue in GB nowadays. Iran and the Gulf states are involved in GB, which breeds sectarianism. The Western countries are also involved.’²⁰³

The people of Gilgit call the Balti people *poloyo* (plural: *poloye*) meaning a person who hails from Pololo (the historic name of Baltistan). It is not derogatory term; is just a name coming down the line of history. Since the first Chief Minister of GB Syed Mehdi Shah (2009 to 2014), the interim Chief Minister Sher Jahan Mir (2015) and the present Chief Minister Hafiz Hafeez ur Rehman (2015 onward) hail from the Kashmiri community of GB, some from other communities say that GB is being ruled by Kashmiris. This is an expression of community security.

²⁰¹ Due to the nature of opinion, name is not being revealed herein.

²⁰² Ibid.

²⁰³ Ibid.

In Baltistan region, Balti and Shina communities do compete with each other. The Shina community have been living in the area for centuries. They are still maintaining their language, identity and subculture. For instance, the people of Sadpara valley, just about 12 kilometres from Skardu, which is the heart of Balti language, still speak Shina. The case of some communities living in narrow torrent-based valleys in Kharmang district is no different. Likewise, in Gilgit, Diamer and Astore districts, Sheen and Yashkun tribes are found at odds on a number of social issues in some areas. Sheen-Yashkun rivalry overshadows the sectarian dissent. On being asked as to why, some people respond: ‘Religion can be changed but ethnicity cannot be.’ Sheen-Yashkun rivalry is rooted in history. Sheen came to the region around 1000 AD. Before this, Gilgit and surrounding area was ruled by Yashkun from 250 BC to 1000 AD. Sheen ruled the area from 1000 to 1450 AD. This has been the historical root of contention. However, Professor Usman Ali views that sect as the ‘dominant reality in GB. Everything revolved around it. Next come ethnicity and is followed by language in the order of precedence of people.’²⁰⁴

Diamer is ostensibly a homogeneous society with 100 percent Sunni community and all people from Dard lineage. However, two sub-ethnic communities – Sheen and Yashkun – are dwelling in the area. Both have great discord on a number of social issues. One community does not often accept an official from the other community appointed in the areas. For instance, in March 2016, they accepted a District and Session Judge hailing from the Ismaili community of Ghizer district rather than the son of Malik Maskeen, ex speaker of GBLA. The latter was rather posted to Skardu.

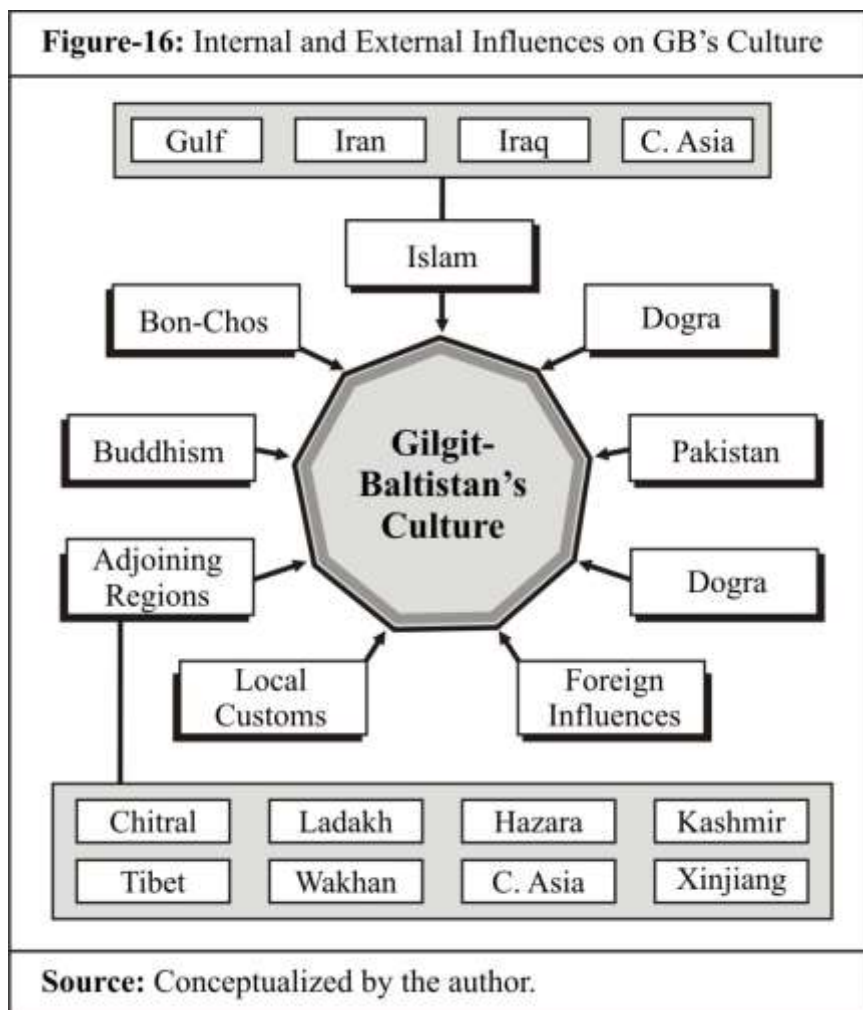
Due to multi-thread fabric of human geography, even the political arrangement remains diverse. Senior political seats are allocated on the basis of ethnicity, sect and area within GB. For instance, after the GBLA Elections on 8 June 2015, the government was structured as follows: Governor Mir Ghazanfar Ali Khan from Ismaili community of Hunza; Chief Minister Hafiz Hafeez ur Rehman from Sunni community of Gilgit; GBLA Speaker Haji Fida Muhammad Nashad from Shia community of Skardu, Baltistan; Senior Minister Haji Muhammad Akbar Taban from Shia community of Skardu, Baltistan; Minister from Information and Education from

²⁰⁴ Professor (Emeritus) Usman Ali, author and historian, telephonic Interview by author, Gilgit, May 1, 2016.

Noorbakhshi community of Ghanche, Baltistan; Haji Janbaz Khan, Minister for Food , Agriculture, Livestock & Fisheries from Sunni community of Diamer district, and so on. It may be reckoned that all sects, linguistic groups, ethnicities and sub-regions are being given representation in the government.

The Cultural Geography of Gilgit-Baltistan

The GB region has a rich culture which is rooted in its geography, both absolute and relative location, and physical and human geography. It has various imprints, both internal and external. Internally, it is rooted in time-honoured local customs and traditions. However, there are hosts of external imprints that worked to shape the culture of GB. The internal and external influences on GB's culture are illustrated in Figure-16.



The adjoining regions influenced the culture of GB due to three factors: Geographical contiguity and resultant exchange of men, material and ideas including culture between the regions; blood relations between various tribes; and political

linkages in the past (some of them have remained part of the same empires for some time in the history). The culture of the western districts of GB – Ghizer and Hunza – has been significantly influenced by the customs and traditions in Central Asia, Wakhan Corridor of Afghanistan and Chitral. Wakhi language, spoken in Wakhan Corridor of Afghanistan, Gorno-Badakhshan Autonomous Region of Tajikistan, Xinjiang region of China, Turkey and Russia, is also spoken in Chipurson valley, Khunjrab valley and Shimshal valley of Upper Hunza, Baroghil and Yarkhun valleys in Chitral, and Iskhoman and Yasin valleys in Ghizer district.²⁰⁵

The culture of Hunza, Nagar, Gilgit, Skardu, Shigar and Ghanche districts is influenced by Xinjiang due to historic trade and cultural ties. Hunza on the southern side of Khunjrab Pass is inhabited by Ismaili community. The same community is living across the border in China. The historical silk route also worked to boost cultural interaction between the communities in GB and China.

GB has been part of the Tibetan Empire from 780 to 790 CE. Besides, due to the Buddhist connection, people from GB have had strong spiritual connection with Tibet in the past. According to some traditions, the Balti language also belongs to the Sino-Tibetan group of eastern languages. It also has similarities with Tamil and Nepali languages. Baltistan region is also referred to as the Little Tibet. The Tibet region is separated from GB by Ladakh. The Ladakhi language also belongs to the Sino-Tibetan group. Besides, Ladakh and Baltistan had historical political and trade relations and were bound by the same geography. There are at least three major routes that link Baltistan with Ladakh, Chorbat La, Indus River and Shingo River, besides several small routes. During the Dogra regime, Ladakh and Baltistan had been merged into one administrative unit called the Ladakh Wazarat. Today, 95 percent of Kargil's population is Muslim (90 percent Shia and 5 percent Sunni) and 5 percent are Tibetan Buddhists.²⁰⁶ This too gives a fair view about likeness of culture.

During Dogra rule, GB had a regular link with Kashmir through Kamri Pass, Fulway Pass and Shounter Pass located in today's Astore district. There used to be trade between GB and various districts of Kashmir right up to Sri Nagar through these passes. This certainly put significant marks on GB's culture. Hazara division and

²⁰⁵ It is language of a very small group of people. Just about 58,000 people speak Wakhi in the entire world.

²⁰⁶ Kargil is one of the two districts of Ladakh region. Kargil city is just about 4 kilometres away from the Line of Control separating the Baltistan region of GB in Pakistan and the Ladakh region of Indian Occupied Kashmir.

Shangla-Swat areas, being closer to Diamer division, have some shadows on the culture of this area.

Buddhism and its predecessor religion Bon-Chos contributed a great deal to outline the culture of the region. Despite that it is 100 percent Muslim region at the moment, several traditions of the Bon and Buddhist era continue to hold. Islam arrived in the region in 14th Century AD. Due to Islamic connection, Iran, Iraq, the Gulf States and Central Asian states have deep imprints on the culture of various parts of GB.

Dogra rule (1840 – 1947-48 AD) also contributed towards progression of GB's culture. To this end, Sher Baz Ali Khan Bercha notes:²⁰⁷

The concept of hygiene was not as good in GB before the arrival of invaders from other geographical regions. For instance, during community functions, the people in Diamer area of GB used to be served food, like animals, in the large wooden containers otherwise used for animal fodder. It used to be re-used for the next group without washing or cleaning. The Dogras brought with them the culture of metal utensils and crockery. Thus, a new banquet culture was introduced.

GB's culture saw further progression since it became part of Pakistan in 1947-1948 after liberation from Dogra rule. In this regard, Sher Baz Ali Khan Bercha said, 'I have seen a rapid cultural evolution since 1947 [after the area became part of Pakistan]. This evolution witnessed further rapidity after construction of the Karakoram Highway. It revolutionized the cultural advancement and eating habits. In Gilgit-Baltistan, we started eating fresh meat, fruits, vegetables, milk products and other eatables. New words became part of the local languages of GB.'²⁰⁸

GB's culture has some foreign imprints too. The British explorers arrived in the region in the eighteenth century. The British officials also remained employed in Gilgit Agency. After liberation in 1947-1948, foreign mountaineers, tourists and trekkers continued to visit GB. All five eight-thousanders of GB had been climbed first by foreign mountaineers. A host of foreign non-governmental organizations (NGOs) are working in GB today. All of them combined have had a bearing on GB's culture. All said, GB's culture is still homogeneous to a great extent. Age-old cultural traditions and customs continue to survive in the region. The people of GB are proud of their culture.

²⁰⁷ Bercha, 2015.

²⁰⁸ Ibid.

The interaction between geography, history and culture (including sports)

Physical geography and climate greatly influence the human geography, culture, sports and festivals. GB has four main seasons: spring, summer, autumn and winter. However, the Himalayan belt adjoining Kashmir also has a small monsoon season in the form of liquid precipitation in July-August. On the other hand, the Western Weather Pattern (WWP) pours solid precipitation over the Hindu-Kush Karakoram Mountains, feeding the glaciers and the snow reservoirs. Both summer monsoon and WWP deeply influence human activities, with the former supplying water for agriculture in the dry season in the form of intense and widespread precipitation, and the latter accumulating snow resources that assure continuous river flow even in the driest months.²⁰⁹

Before the arrival of Islam in GB, it was largely a Buddhist region. The animistic religion Bon-Chos was the predecessor of Buddhism in GB. These two religions were influenced greatly by geography. Buddhism arrived in GB from Xinjiang, Tibet and India due to geography proximity. Baltistan is also called Tibet Minor or the Little Tibet. The Bon-Chos religion had several religious festivals. These festivals carried through later during the Buddhist era and some of them are still being held in some forms. This is where geography, history, religion and anthropology join in GB and make a good combination to contribute towards human security.

These festivals were season based. There are several examples of seasonal festivals in the world. For instance, Besakhi is a harvest festival celebrated in the Punjab province. With the onset of spring season, people used to hold festival of welcoming spring and beginning of farming season. This season was called Sonbor. A set of sports and cultural activities were used to be held as part of Sonbor. It used to be held in the first week of March. Another festival called Strobhla was celebrated at the time of harvest in summer season. Music, dance and sports events were the characteristic features of this festival.

In winter, the Kopolo events used to be held between the village teams. It was a game somewhat similar to hockey wherein homemade sticks resembling hockey

²⁰⁹ Silvia Terzago, et al., 29th Himalaya-Karakoram-Tibet Workshop, "Precipitation and Snow Resources in the Hindu-Kush Karakoram Himalaya Mountains: Current Picture and Expected Changes," held at Lucca, Italy, September 2-4, 2014.

sticks were used with a leather ball double the size of a cricket ball. It was held in the middle of each village in the largest available field. It used to be held immediately after complete vacation of fields in November but would conclude before December 21. The Shigar Tourism Association (STA) has been trying to revive Kopolo since 2014. Pakistan Army, district administration, Pakistan Tourism Development Corporation (PTDC) and Agha Khan Rural Support Programme (AKRSP) are supporting this pursuit. Since 2014, several events have been held. Therefore, it has been shored up and is being supported by a number of quarters including the good offices of bureaucracy.

On December 21, a festival called *May Fung* in Balti language also known as *Dawat* and *Shari Bidat* (in Shina and Burushaski languages) was held. It used to be the largest festival of winter and is still held across GB. During 2015, it was held in Shigar, Skardu, Hunza and Khaplu. The religious community objects to the event thinking that it amounts to a revival of Buddhism. To note, it is also observed in Buddhist majority areas of China. Some people also think that it is an Iranian festival due to the use of fire because of Zoroastrian linkage with ancient Iran but actually it has come down from the olden days of GB.

In *May Fung*, the male members of the village used ascend the adjoining mountains in the afternoon with juniper made flame lamp in their hands. They would set the juniper lamps on fire followed by releasing locally made chandeliers downward. Now-a-days, some people burn tyres etc. After that, with the juniper lamps in their hands, they come down to the village in a line formation. Having reached the village, they release locally-made chandeliers. The *May Fung* dinner is full of local dishes such as *Parrappoo* (prepared by walnut paste), *Strabkhor* (sweet bread), *Ballay* (local soup), meat items, apricot and butter etc. Often, *Kopolo* final is played on December 21 as part of *May Fung*.

Nasalo is another event observed in GB. It relates to food security. Yaks, zos, goats and sheep were slaughtered depending on the financial backbone of a household and their meat preserved for consumption throughout winters. It used to be held after December 21 and is still in vogue all over GB. However, frequency has decreased as compared with the olden times due to a host of reasons such as evolution of a civic society in urban settlements, inflation, poverty, and availability of meat in meat shops in many places as a matter of routine. Anyway, it was a course of geo-humanism, specific to GB. According to Wazir Jaffar, an educationist from GB, 'All these events

are influenced by climate and thus geography of GB and the neighbouring areas.’²¹⁰ Other adjoining regions such as Ladakh in IOK, Xinjiang in China, Chitral in KPK province, Wakhan Corridor in Afghanistan and Gorno-Badakhshan Autonomous Region in Tajikistan have a similar meat preservation culture.

From March 21 to March 31, the festival of Nauroz is celebrated. It is actually an Iranian festival and starts on the first day of the month of Farvardin in the Iranian Solar Hijri calendar. Nauroz was recognized by the UN General Assembly as an international day noting it as a spring festival of Persian origin with over 3,000 years of history of celebration. It has Zoroastrian roots. It is celebrated by the Iranian people all over the world, and also observed in Albania, Azerbaijan, Pakistan, Afghanistan, Turkey, China, India, Syria, Iraqi Kurdistan, Russia, Turkmenistan, Kazakhstan, Kyrgyzstan, Azerbaijan, Tajikistan and Uzbekistan. In GB, it is not celebrated in Diamer district as its population is completely *Sunni*. In GB, polo events often start on 21 March. An egg breaking competition is also held. On the eve of Nauroz, eggs used to be cooked in all houses. It is still in vogue in remote areas. People wear new clothes, visit the houses of their relatives to eat and drink together. Local dishes and tea are also served.

During the pre-Dogra period, these events used to be held under the auspices of the Rajas, who used to finance and supervise them. These games and festivals are still being held in some areas of GB with sponsorship of Raja families.

Polo is another local sport, which is played all over GB and the adjoining mountainous regions. There is a geo-humanistic reason behind it. According to some traditions, polo originated in Central Asia in sometime between sixth century BCE and first century BCE. The Mughal introduced it in the subcontinent.²¹¹ There are other traditions that suggest that *pulu* was a word of the Tibetan language meaning ball, and therefore it started in Tibet. At any rate, the word *polo* in the Balti language also means ball. Therefore, it is believed in GB that the game of polo originated in Baltistan. It may also be noted that many words in Balti and Tibetan language are same.

Polo is played in all ten districts of GB. Polo teams exist at district levels. Cities like Gilgit and Skardu have over a dozen polo clubs each. Each village

²¹⁰ Wazir Muhammad Jaffar, Lecturer, Government College Khaplu, Ghanche district, Interview by author, Khaplu, October 16, 2015.

²¹¹ James Wynbrandt, *A Brief History of Pakistan* (New York: Facts on File, 2009), 72.

contributes horses and players to one team or the other. Some institutions such as police, public works department (PWD) and district administration have their own teams. Actually, due to availability of water and fodder in the form of grass, it is easy to breed horses in GB. Horses are used for conveyance and carriage also. Polo championships are held across GB during Nauroz celebrations and on various festivals such as Rama Lake festival in Astore district and Shandur festival in Ghizer district, and so on.

Dafang (Archery) was another game played in GB. It used to be practised and played towards the end of the spring season (in May – June). It is still played in some remote areas. It used to be held in common hall of the village called *chopal*. On the last day of *Dafang* competition, a festival called *Grong Haltanmo* used to be held in each village. All male members of the village used to go to the adjoining mountains. The night used to be spent in cooking, eating, dancing and festivity. Next night, they used to come down and perform sword dance in the village *chopal*. Alongside, there used to be many other events in the *chopal* such as storey telling, joke narration and comedy by certain village men. *Grong Haltanmo* is no more held. The clergy opposes it squarely. Wazir Jaffar recalls that it was held in his village Gazwapa located in Shigar district and the adjoining village Gianpa the last time in 1968, which he was part of. After that, *Grong Haltanmo* has never been held therein.²¹² At any rate, *Dafang* and *Grong Haltanmo* have had a direct imprint of geography: Geo-humanism.

Taku Polo used to be played in the streets and fields of GB. In Taku Polo, the players used the polo sticks and a woollen ball, smaller than the actual polo ball, but instead of riding horses, they ran on foot. It was a poor man's solution to non-availability of horses and polo ground. It is still played in some remote areas, for example in Chipurson valley in Upper Hunza, but the frequency has reduced as compared with the past.

Zakh competition is often held in GB, albeit with lower frequency now. The last such competition was held in Indus River at Skardu in 2011. *Zakh* is a locally made raft of wood and leather. The wooden *zakh* is called *shinzakh* (shin means wood). In olden times, it was used for crossing rivers and torrents. With construction of bridges (there are 133 bridges in Baltistan division alone), the utility of *zakh* has

²¹² Jaffar, 2015.

reduced. Hardly a few families make and operate *zakh*, that too in a few selected pockets in the region.

Buzkashi is an age-old traditional sport of Central Asia and Afghanistan in which the players, while riding horses, drag a slaughtered and headless goat. It is also called Kokpar and Kukpari. It is national game of Afghanistan. In GB, it is played annually between the players from Wakhan Corridor of Afghanistan and Chipurson valley of Hunza district in GB during the annual festival on Baba Ghundi Ziarat. However, it is not played all over GB region.

Football and volleyball were introduced in the region after Dogra invasion in 1840 AD. These games started in schools and Dogra military cantonments and not from the streets of villages. It picked up after liberation in 1947. However, there used to be only two clubs of football in Baltistan in 1960s – Baltistan XI and Deputy Commissioner XI. They often used to play with Army teams. The clubs continued to increase. Now, there are over 100 football, volleyball, hockey, and polo clubs in the region. One or both of these games are played in most of the villages. Regular tournaments and championships are held almost in all districts. The sport of hockey came into the area after 1947 following the liberation from Dogra rule and accession with Pakistan. Cricket came after 1970 and became popular after 1980.

New sports and festivals have arrived GB due to more facilities and better connectivity with other geographic regions. Earlier, the people used to travel on animal back or on foot. Now, the geography is being moulded to support human security pursuits. However, the people of GB have not been able to contribute much in sports at national level because of lack of opportunities. The region lacks sports facilities and sports ground and stadiums as compared with other provinces of Pakistan. There are no sports training academies and no worthwhile departmental teams. The region is ignored in the realm of sports on the whole.

Chapter-5

GEO-HUMANISM
THE ROLE OF GEOGRAPHY IN HUMAN SECURITY IN GILGIT-
BALTISTAN

“Great things are done when men and mountains meet.”

– William Blake²¹³

The geography of an area has a direct impact on all human activities. Geography restricts, facilitates or generates all human pursuits. While in some cases it provides protection, in others it can be the undoing of even very established and stable societies. Gilgit-Baltistan is no exception and its landscape has greatly affected the makeup of the social and cultural structure of this region. According to Afzal Ali Shigri, ‘Gilgit-Baltistan has a bloody history of a total subjugation and in some cases elimination of the people living in the scattered valleys by the outsiders who eliminated the entire population and settled there.’²¹⁴ This means that not only GB endured remoteness from the adjoining regions but also within. The mountains served as dividing walls within the region. Afzal Ali Shigri goes on to say, ‘The people settled in different valleys are separated from each other and isolated. This has resulted in distinct cultural, linguistic, religious and racial division. These independent social structures developed and sustained without any outside interaction for centuries. This created distinct societies highly suspicious of outsiders and inherent prejudice against other valleys embedded in a long history of mutual conflicts, that with time became the part of the folklore and local history.’²¹⁵

Political Security

Political security in GB can be studied from numerous angles such as constitutional status, linkage with the UN Resolutions on the Kashmir dispute, the issue of identity, political participation and deprivation, political representation in the national institutions, political structure in GB, political awareness and the role of communities. All these facets are somehow influenced by geography of the region

²¹³ A verse from a 1908 poetical work of William Blake.

²¹⁴ Afzal Ali Shigri, ex Inspector-General Police (IGP) Sindh (hails from Shigar district of GB), author, analyst, columnist, Interview by author, via email, May 13, 2016.

²¹⁵ Ibid.

both in absolute and relative terms. The GB region has a special political status and has a kind of relationship with Kashmir and the federation of Pakistan, peculiar to itself. According to the constitution of Pakistan, it is not a federating unit of the country. It is linked with the UN resolutions on Kashmir which call for plebiscite in Kashmir so that the people of Kashmir can determine their political destiny. On the other hand, it is not part of AJ&K as a political entity and rather has a separate status, which it has attained after a long constitutional journey since 1947-48.

The core issue is the constitutional status of GB. There are three views on the issue of constitutional status: (1) GB as the fifth provinces of Pakistan. Majority of GB supports this as the future of GB; (2) GB as part of Kashmir. Majority of the Kashmiri populace on both sides of the line of control supports this as the future of GB. This also has a linkage with the UN resolutions on Kashmir; (2) GB as a sovereign state. This view is upheld by a sub-nationalist minority in GB. Nazir Naji from Ghizer, Baba Jan from Hunza and Haider Shah (now deceased) from Kharmang have been the chief proponents of the idea.

The federal government of Pakistan has held a mixed view on the constitutional status of GB. Whereas it supported GB as part of the UN resolution calling for plebiscite in Kashmir (including GB), it kept GB detached from Azad Jammu and Kashmir (AJ&K) since independence. The GB region has traversed a phased constitutional and administrative journey since 1947-1948. Let us have a brief overview:

Interim Govt. On 1 November 1947, an interim government was formed in Gilgit by the revolutionary council under Raja Shah Rais Khan.

Inclusion in NWFP and Extension of the Frontier Crimes Regulation (FCR).

On 16 November 1947, Sardar Alam Khan reached Gilgit as the political agent of the Government of Pakistan. Initially, GB was made a part of the North West Frontier Province (NWFP), now known as the Khyber-Pakhtunkhwa province, and the 1901-vintage FCR were applied to the area as was the case with the Federally Administered Tribal Areas (FATA). In the course of research, it was revealed that the state functionaries sitting in Karachi, the then federal capital, did not know much about GB and took it as an area akin to FATA. Thus, they not only linked it with NWFP but also applied FCR therein.

The Karachi Agreement 1949 and Direct Federal Rule 1950. The Karachi Agreement was signed in on 28 April 1949 by Mushtaq Ahmad Gormani,

Minister without Portfolio in the Government of Pakistan, Sardar Muhammad Ibrahim Khan, the President of Azad Jammu and Kashmir, and Chaudhry Ghulam Abbas, the Head of All Jammu and Kashmir Muslim Conference. As a result of this agreement, Gilgit-Baltistan was taken under direct federal rule in 1950.

Extension of Dehaat Sudhaar Programme. In 1958, President Ayub Khan extended the federal government's programme "Dehaat Sudhaar," introduced in other provinces, to Gilgit-Baltistan as well.

The Sino-Pakistan Border Agreement 1963. In accordance with Article 6 of this agreement, both Pakistan and China agreed that in the event of settlement of the Kashmir issue, the sovereign authority concerned (if other than Pakistan) will reopen negotiations with China on demarcation of border. On an impartial note, whether or not China got more area from Pakistan in exchange for pastures in Hunza, the boundary between Pakistan and China as demarcated in 1963 make geographical sense as it runs over the defined watershed separating the Tashkurgan River and Tarim River drainage system on the Chinese side and the Indus River drainage system on the Pakistani side. Starting from the Little Pamir in the east, the boundary moves over the Kilik Pass (4,828m), Mintika Pass (4,726m), Khunjrab Pass (4,763m), Shimshal Pass (4,735m), East Muztagh Pass (5,422m), West Muztagh Pass (5,376 m), going over the Karakoram watershed by moving exactly over the four eight-thousanders i.e. K-2 (8,611m), Broad Peak (8,047m), Gasherbrum-I (8,080) and Gasherbrum II (8,068m), it crosses over Sia Kangri (7,422) and Teram Kangri (7,462 m) and leads straight to the south-eastern extremity at the Karakoram Pass. The Siachen Glacier fell into the territory of Pakistan before it was occupied by India on April 13, 1984.

With regard to handing over of territory of the States of Hunza and Shigar by Pakistan in accordance with Border Agreement of 1963, there are contending and differing versions. There are people who believe that the territory across Khunjrab Pass in Pir Ali and Tashkurgan area was given away by Pakistan to China even though the Hunza state had grazing rights over it before the creation of Pakistan. Professor Usman Ali has a different point of view. He thinks that the Hunza state had grazing rights over the territory under discussion in exchange for payment. The state of Hunza used to pay for grazing but the area was actually not owned by Hunza. Professor Manzoom Ali also thinks alike. He maintains that the Hunza state had a claim over it but not ownership. The rulers of Xinjiang had given them some

concessions for grazing purposes. There had also been wrangling over it between Hunza and Xinjiang during the 19th century.

According to Professor Manzoom Ali, China also gave some territory to Pakistan for use as summer pasture by the Shimshali community of Upper Hunza. As regards the Shaksgam, there are differing claims. Indian authorities claim that Pakistan ‘gifted’ Shaksgam valley to China during the 1963 Border Agreement. Raja Azam Khan, the decedent of the ruling Amacha family of Shigar said, ‘Shaksgam was part of the state of Shigar’.²¹⁶ Professor Manzoom Ali stated that both sides – Kashgari and Shigri – made use of the Shaksgam area in the pre-1840 era. Geographically speaking, Shigar belongs to the Indus River drainage system while Shaksgam falls in the Tarim River drainage system. The maps of British India in 1893 and 1909, given in Figure-17, show Karakoram Range as the northern boundary of the British Empire. Shaksgam valley is not shown as part of the empire albeit Aksai Chin in the northeast of Ladakh is clearly a part of the empire. Historians and policymakers can best trace the factual position.

Formation of Northern Areas. In 1970, the area was declared a separate administrative unit under the name ‘Northern Areas’.

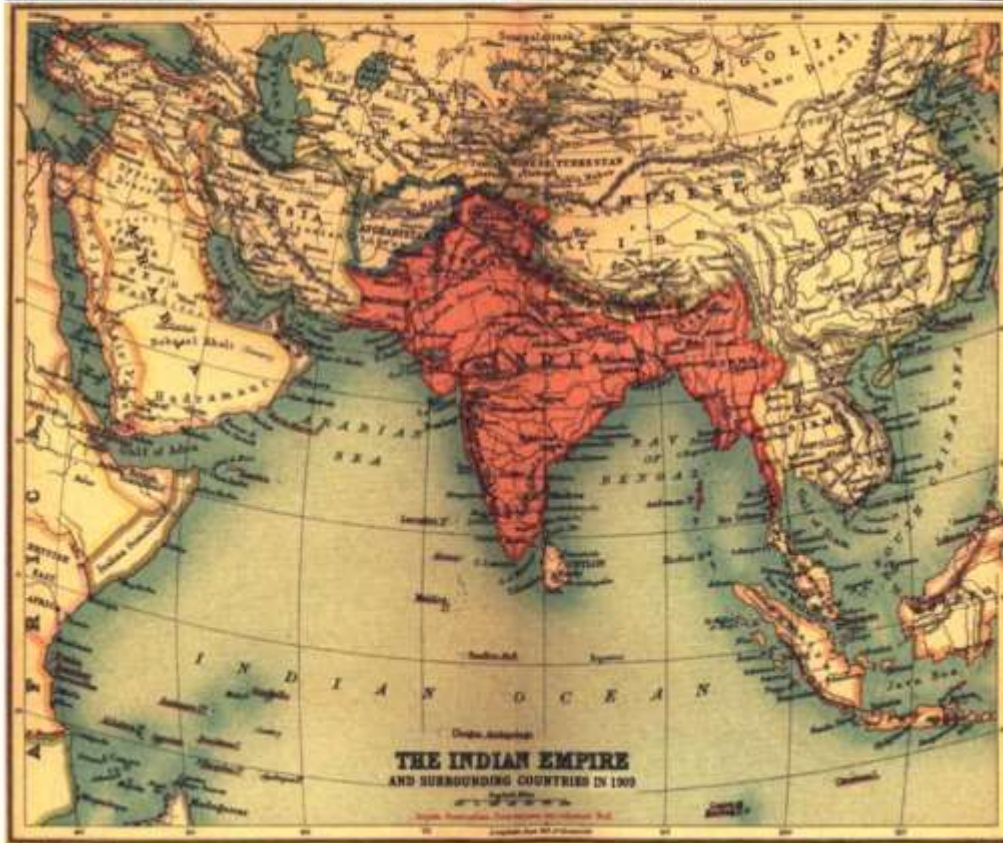
Formation of Northern Areas Consultative Council. In 1970, President Yahya Khan formulated consultative council in GB. It comprised 16 members with powers to approve development projects.

GB – Not a Disputed Part. In a cabinet meeting on 13 Nov 1973, Prime Minister Zulfikar Ali Bhutto categorized GB as an indispensable part of Pakistan. He said that it could not be declared as a province because of low level of socio-economic development and that it would be done so after 10 years of focus on poverty alleviation. During a press meet on 9 May 1982, President Zia-ul-Haq said, ‘Kashmir has remained a disputed issue but we do not consider the Northern Areas as disputed’.

Abolition of Rajgiri and Jagirdari System and FCR. In 1974, PM Zulfikar Ali Bhutto extended reforms to GB whereby the system of *Jagirdari* and *Rajgiri* was abolished. His government also put an end to the FCR in GB. The region was converted into political districts rather than an agency. Diamer district was founded in December 1972 while Ghanche and Ghizer followed in September 1974.

²¹⁶ Raja Azam Khan, ex member GBLA from Shigar district and decedent of the ruling Amacha family of the state of Shigar, Interview by author, via telephone, Shigar, May 3, 2016.

Figure-17: Maps of the British Indian Empire –1893(above) and 1909(below).



GB – A Martial Law Zone. In the aftermath of General Zia ul Haq’s martial law in 1977, the country was divided into five Zones, GB being one of them: Martial Law Zone E.

Representation of GB in Federal Majlis-e-Shura. President Zia ul Haq extended the representation of federal *Majlis-e-Shura* to GB. GB was also represented in the federal cabinet wherein Agha Syed Ahmed Ali Shah (Late) was made advisor for Northern Areas (NA) affairs, a post equivalent to federal minister. This practice continued till Ms Benazir Bhutto’s government wherein Mr. Qurban Ali was the advisor on NA affairs.

Provincial Administrative Structure 1994. During Ms Benazir Bhutto’s second tenure, the administrative structure of NAs was re-constituted on provincial lines in May 1994. The first Chief Secretary was posted to GB in 1994 and the secretaries for various departments were also posted. The post of Deputy Chief Executive was also created for NAs while Minister for Kashmir and Northern Areas Affairs (KANA) was to act as Chief Executive of the Council. The Council comprised of 24 directly elected members with powers to legislate on 49 subjects.

NA Legislative Council. Mian Nawaz Sharif’s govt turned the NA Council into NA Legislative Council (NALC) and included seats for technocrats and women.

The Supreme Court’s Decision – Extension of Citizen Rights. On 28 May 1999, the Supreme Court of Pakistan decreed: “That the People of Northern Areas are citizens of Pakistan for all intents and purposes and like other citizens have the right to invoke any of the Fundamental Rights as enshrined in the Constitution. The said people are also entitled to participate in the governance of their area and to have an Independent Judiciary.”²¹⁷

Speaker and Deputy Speaker. President Pervez Musharraf’s government included the posts of Speaker and Deputy Speaker in the NALC.

Legal Framework Order 2007. In accordance with the Legal Framework Order introduced on December 15, 2007, NALC was re-named Northern Areas Legislative Assembly (NALA) with a few more powers. Besides, the Chief Court and

²¹⁷ Al-Jehad vs. the Federation of Pakistan, 1999 SCMR.1379, constitutional petition No. 11 and 17 of 1994, dated May 18, 1999.

Supreme Appellate Court were brought on par with the High Courts in other provinces and the Supreme Court of Pakistan respectively.

Gilgit-Baltistan Empowerment and Self Governance Order 2009. This was the most comprehensive empowerment package for GB introduced by the PPP-led federal government. In accordance with this Order, the region was renamed Gilgit-Baltistan and restructured as a province. The posts of Governor, Chief Minister and ministers for various departments were introduced.

After the GBLA elections on June 8, 2015, the PML-N led government was formed in the GB. Prime Minister Muhammad Nawaz Sharif announced that he had formed a committee headed by Sartaj Aziz, the National Security Adviser to put up recommendations with regard to constitutional status

The GB Council. The Gilgit-Baltistan Council is an umbrella legislative body which comprises 15 members as follows:

- Chairman - Prime Minister of Pakistan.
- Members
 - Governor Gilgit-Baltistan.
 - Chief Minister Gilgit-Baltistan.
 - Six members, often federal ministers, nominated by the Prime Minister.
 - Six members elected by GBLA through an election held in GBLA for the purpose.

The GB Legislative Assembly. It comprises a total of 33 members – 24 directly elected members, three technocrats and six women members.

Still Short of Constitutional Status. The region is, however, still short of a definite constitutional status within the federation of Pakistan.

The Judicial Process. AJ&K High Court. The AJ&K High Court, accepting petition number 61 from Malik Muhammad Miskeen and Haji Amir Jan in 1990 that challenged Pakistan's authority to administer the Northern Areas, ruled in 1993 that Pakistan had 'no legitimate cause to keep the Northern Areas and their residents detached from AJ&K'. It directed the AJ&K government to 'immediately assume the administrative control of the NAs and annex it with the administration of AJ&K'.²¹⁸

²¹⁸ Intiaz-ul-Haque: 26-27, republished by Pamir Times, <http://pamirtimes.net/wp-content/uploads/2016/01/Determining-the-Political-Status-of-Gilgit-Baltistan-Future-Perspectives.pdf> (accessed February 24, 2016). This petition had a sectarian dynamic also. The petitioners belonged to the Sunni community of Diامر district. This petition was submitted in the aftermath of the horrific

AJ&K Supreme Court. Pakistan appealed to the AJ&K Supreme Court, which overturned the High Court's verdict on March 12, 1994, declaring that while the NAs were an integral part of the former state of J&K, they were not a part of AJ&K. However, it did not declare it to be part of Pakistan.²¹⁹

Supreme Court of Pakistan. On 28 May 1999, the Supreme Court of Pakistan delivered a landmark judgement on the constitutional status of the Northern Areas in response to Constitutional Petition 17 of 1994 submitted by Al-Jihad Trust through Habib-ul-Wahab Al-Khairi, which sought the following remedies:²²⁰

- Enforcement of fundamental rights under the constitution of Pakistan.
- Declaration of the Northern Areas' constitutional status.
- Declaration of the people of the NAs as full citizens of Pakistan, with the right to participate fully in the affairs of the federation.
- Granting of provincial status.

The court judgement also recognized the role of geography in these words:

It may be observed that since the geographical location of Northern Areas is very sensitive, because it is bordering India, China, Tibet and Russia, and as the above area in the past have been treated differently, this Court cannot decide, what type of Government should be provided to ensure compliance with the above mandate of the constitution, neither we can direct that the people of Northern Areas should be given representation in the Parliament at this stage.

Relevance with the UN Resolution on Kashmir

The UN Resolution of 21 April 1948 calling for plebiscite in the state of Jammu and Kashmir does not definitely point to the GB region. It generally talks of the state of Jammu and Kashmir. However, due to the background discussion at that time and subsequent developments, the political destiny of GB region had been inextricably linked with that of Kashmir. Nevertheless, it remains to be a matter of debate in the policy and intellectual circles and is a street talk in GB as to how its political future can be linked or detached from that of Kashmir. It is a matter of fundamental rights and a human security dream of the people of the region.

events of sectarian violence in 1988. People from both sides i.e. Sunni and Shia were killed. Both had their own kind of concerns and responses. Many from the Sunni community saw better prospects of human security if GB's future was linked with AJ&K, the region which is predominantly Sunni by sect.

²¹⁹ Ibid.

²²⁰ Al-Jehad vs. the Federation of Pakistan, 1999 SCMR.1379, constitutional petition No. 11 and 17 of 1994, dated May 18, 1999.

The Voices from Kashmir

The government and people of Azad Jammu and Kashmir (AJ&K) contend that GB is part of Kashmir and they resent GB becoming a constitutional province. AJ&K, being a small political entity, finds solace in political connection with GB, which is a territorially larger entity. They believe that any political transformation in GB would be detrimental to the cause of Kashmir. They also reckon that the future of GB must remain linked with Kashmir and its political destiny must be determined through UN resolutions or any other formula that may be mutually agreed upon but which does not detach GB from Kashmir. Their argument for GB to be a part of Kashmir is on the history of being in a single state under Dogra rule from 1846 to 1947, the UN resolutions on Kashmir, Article-6 of the Sino-Pakistan Border Agreement 1963 and the Simla Agreement 1972 between Pakistan and India are cited as the examples that corroborate GB's linkage with Kashmir. Hence, any change in GB's constitutional status is resisted.

Specifically, when the Governance Order of 2009 was introduced in GB, it was opposed in AJ&K. AJ&K government and society would disagree with any change in constitutional status of GB. The GB government and society is at variance with this stance. To this end, the official spokesperson of GB government, Muhammad Ibrahim Sanai, Minister for Information and Education, during an interview the author said, 'The Kashmiri leadership should first make a dialogue with the GB leadership'.²²¹

The case of the Indian-Occupied Kashmir (IOK) is no different. On the issue of GB, both parts of Kashmir think alike. It was practically manifested in the form of a letter that the famous All-Parties Hurriat Conference (APHC) leader Yasin Malik, hailing from the IOK wrote to the Prime Minister Nawaz Sharif of Pakistan asking him not to make any such decision with regard to the constitutional status of GB including giving it a provincial status within the federation of Pakistan. He stressed that it would lead to damaging the cause of Kashmir and that hostile agencies might try to create and support public anxiety on either side of the Line of Control in Kashmir.

²²¹ Muhammad Ibrahim Sanai, Minister for Information and Education in Gilgit-Baltistan, Interview by author, Skardu, September 26, 2015.

During an interview with the author, Ambassador Arif Kamal, a scholarly figure from AJ&K, said, ‘Post-1947, separate political developments in GB and AJ&K led to creation of separate identities’.²²² An Indian citizen cannot buy land in Jammu and Kashmir, but can, however, lease it. A Pakistani citizen, too, cannot buy land in AJ&K; but can just lease it. Nevertheless, the case of GB is different. A Pakistani citizen can buy and own land in GB. Mr Kamal believes that ‘Pakistan has made the Kashmir issue more complex’. He considers that ‘geography was used as one of the “pretexts” for separate political developments. Geographic linkage between GB and Kashmir could have been a strong point but it has not been utilized by the state of Pakistan after 1947.’ Mr Kamal is right with regard to the geographic context. During the Dogra rule, there were various routes, primarily foot and animal tracks, between GB and Kashmir. The routes such as Chorbat La, Indus valley, Shingo valley, Mashkoh valley and Marpo La etc existing between Baltistan and Ladakh regions were closed as these two regions fell in Pakistan and India’s administered parts of Kashmir respectively after 1948. However, the routes linking GB and AJ&K such as Shounter Pass, Fulway Pass and Kamri Pass (linked across Burzil Pass) were also not utilized fully by constructing metalled roads. Construction of Karakoram Highway and the road across Babusar Pass has been a good omen for GB to do away with its remoteness but it also worked to break its erstwhile linkage with AJ&K and onward to IOK.

According to Mr. Kamal, if Pakistan sanctifies GB’s separation from Jammu and Kashmir under constitutional cover, it would have a twofold effect: (1) Pakistan would lose legitimacy vis-à-vis the trifurcation agenda of Bhartiya Janata Party (BJP)-led government in India. The idea of trifurcation of Kashmir implies making Ladakh region an Indian union territory, Jammu region a part of the state of Himachal Pradesh and the valley as a separate state; (2) Pakistan would indirectly and inadvertently give a message of compromise to the Kashmiri freedom seekers.²²³ He argues that if representation-for-empowerment is the narrative or necessity, Balochistan should have been the much empowered province. Thus, empowerment and representation have to be seen differently, he upholds. Improved economic

²²² Ambassador Arif Kamal, Director Global Studies, The Institute of Strategic Studies, Research and Analysis (ISSRA), National Defence University (NDU) Islamabad, Interview by author, December 15, 2015.

²²³ Ibid.

governance can work towards enhanced empowerment in GB. CPEC would also contribute towards better economic governance.

Mr Kamal thinks that Islamabad has a fear of destabilization in GB. He suggests, ‘Authority and empowerment to govern them, not representation, is its cure. Pakistan should have no fear in the presence of GB Council, which is a means to co-governance.’ Mr. Kamal is academically right but the people of GB want representation in the federation’s institutions. They deem that empowerment would come by the way of representation. During discussion with the author in the course of research, a number of scholars and politicians of GB expressed a fear of being reduced into a minority as part of Kashmir whereas they would have full provincial autonomy and authority as a separate province of Pakistan. During the British Era, the Maharaja of Kashmir did not have the powers of foreign affairs, defence, communication and currency. It was part of the British paramountcy. In 1947, Pakistan’s flag was hoisted on post offices all over Kashmir due to the standstill agreement between the Maharaja of Kashmir and the State of Pakistan.

The Indian Stance

India takes GB as part of the wider issue of Kashmir and deems it to be a part of India as a territorial region of Kashmir. Due to the same notion, India upholds that it has a 106-km border with Afghanistan (GB – Wakhan Corridor boundary). A lot of Indian literature has focussed on GB, its significance, C-PEC, various other economic and energy-related projects and political future of the region. India resents political upgradation of GB and would take all possible measures to prevent it. However, not a single person in GB wishes to be part of India. According to Muhammad Ibrahim Sanai, Minister for Information and Education ‘There is no logic in Indian contention that GB is part of India. But Pakistan is unable to respond aptly. The best is to include the people of GB in all dialogues. We have never been part of India geographically, ethnically, linguistically or religiously.’²²⁴

The Karachi Agreement of 1949 and its Relevance

The Karachi Agreement was signed on April 28, 1949 between the Government of Pakistan and the Kashmiri leadership. According to this agreement, the GB region became part of AJ&K. The Karachi agreement included the following

²²⁴ Sanai, 2015.

as signatories: Sardar Ibrahim Khan, President AJ&K, Sardar Ghulam Abbas, the Muslim Conference and M.A. Gormani, the Minister without portfolio of Pakistan. The People of Gilgit-Baltistan contend that GB was not represented in the said agreement; therefore, the political future of the region could not be decided by those who had no linkage with it. They also argue that Gilgit had acceded to Pakistan on November 16, 1947 and Baltistan on August 14, 1948, whereas the Karachi Agreement was signed later. The political agent of the Government of Pakistan reached Gilgit on November 16, 1947 following the request of the people of GB, not the Kashmiri leadership, which was still contesting the Indian aggression at that time. Thus, how could the area be made part of AJ&K after formal accession to Pakistan and ratification by Quaid-i-Azam Muhammad Ali Jinnah? There is yet another controversy. Sardar Ibrahim denied having signed the agreement. Haji Fida Muhammad Nashad, Speaker GBLA informed the author, ‘Sardar Ibrahim told me personally that he had never signed the Karachi Agreement’.²²⁵

The Karachi Agreement between India, Pakistan and AJ&K has no legal status or moral binding for GB as the people of GB were not part of that agreement. GB has remained unrepresented in all agreements, accords and resolutions, which pertained to its constitutional status within or outside the federation of Pakistan, whereas the people of AJ&K have been represented on numerous forums. People even contend that after remaining independent for thousands of years and later having been under Dogra oppression for 108 years (1840-1948 AD), the region could not become an inseparable part of J&K. They also give the analogy of Pakistan that it has once been part of India, and India itself was once under the British rule, but today they are two independent countries.

Mr Qasim Naseem, a senior journalist from Skardu, in his book *Gilgit-Baltistan aur Masla-e-Kashmir* (Urdu), presents his logic on the issue in the following words:

The point to understand is that the Dogras entered Baltistan by means of military aggression. Other than that, there had neither been a constitutional or legal basis, legitimacy or rationale for their rule in GB, nor did the people accept their illegitimate rule. Hence, the Dogra occupation of the region following a military invasion cannot be a *raison d’être* for GB to be part of J&K. If GB can be declared a part of Kashmir, then both Pakistan and India could be declared a constitutional part of Britain. Kashmir itself has been ruled by Sultan Saeed Khan Kashgari and for a given period Afghans too. But it neither became of part of Kashgar nor an

²²⁵ Haji Fida Muhammad Nashad, Speaker Gilgit-Baltistan Legislative Assembly (GBLA), Interview by author, Skardu, October 28, 2016.

atoot ang of Afghanistan. Likewise, we are not ready to accept IOK as part of India despite that it is under Indian administration since 1948.

Muhammad Qasim Naseem, during an interview with the author, said, ‘There are a number of options discussed as regards the future of Kashmir. We, the people of Gilgit-Baltistan, have a single option: Pakistan.’²²⁶ Qasim Naseem is not wrong. The opinion of the Kashmiri leadership is divided between: pro-Pakistan, pro-independence and pro-India elements. The pro-India leaders are mostly the non-Muslims including Hindus, Sikhs and Buddhists. The opinion of the Kashmiri leadership is almost unanimous: GB is part of Kashmir.

Most people of GB argue that there is no need for plebiscite in the region and that their elders had already acceded to the state of Pakistan in 1947-1948. Some people of GB uphold that the Kashmiri leadership should first have a dialogue with them to prove that GB is part of Kashmir. They also point to sub-nationalist elements in Balochistan who raise the slogan of separation from Pakistan but it remains a constitutional part of the country. On the other hand, the people of GB are espousing firmly the notion of Pakistan nationalism but GB is yet to be a constitutional part of Pakistan. The youth often expresses its opinion on social media, and is also engaged easily by hostile elements including India on social media.

The Opinion of the Youth

The youth in GB is gradually taking a hard stance on various issues such as constitutional status, GB’s share in CPEC and the state of development. The youth of Baltistan is quite enraged on the state of Gilgit-Skardu road and delay in its reconstruction. They give a loud opinion on these issues in private meetings and on social media. These issues were discussed stridently following a two-day seminar on CPEC jointly organized by the GB government and Karakoram International University (KIU) in August 2016. At times, it gets a sectarian overtone. Some young men believe that GB is not being given constitutional status only because it will become a Shia-majority province of Pakistan. They also contend that GB was liberated by Shia people of the region. Evidently, the socio-political environment in GB is fast transforming. Even the mainstream senior leaders join the youth’s opinion

²²⁶ Naseem, 2015.

camp in private meetings albeit their stance in open and before media is more of political, tactful and nationalistic. Leadership is gradually shifting to the third generation, which is quite vocal. It is believed that if GB is not given constitutional status of province, the socio-political milieu may change significantly during the next two decades.

The Philosophy of Sub-Nationalism

Despite the fact that the people of GB liberated the GB region without noteworthy external support and notwithstanding that they have yet to be constitutionally integrated into the federation of Pakistan, sub-nationalist thought has not gained much popularity in the region. *Inter alia*, it can be gauged from the fact that only one known sub-nationalist, Nawaz Khan Naji, won a seat from Ghizer district as an independent candidate in GBLA in the 2015 General Election. However, sub-nationalism cannot be underestimated or taken too lightly by the state. The number of people in GB with sub-nationalist disposition are nothing less than many thousands. Actually, their numbers cannot be determined from the number of votes the candidates with sub-nationalist thoughts or slogans get. Many people, otherwise with clear sub-nationalist feelings vote for the candidates from mainstream political parties due to reasons other than similarity of political thought. It could be because of ethnic, sectarian, linguistic or family bondage. Many people in GB vote for the candidates from the political party ruling in the centre so that the region may benefit from the political and financial powers of the federation. Anyway, sub-nationalist thought exists and is likely to proliferate if the constitutional status of the region remains in limbo.

There have been numerous sub-nationalist parties and groups. Some of these do not exist anymore while a few have been replaced with others. The Gilgit League was established by Colonel Mirza Hassan Khan in 1957 against imposition of Frontier Crimes Regulation. It could not be registered and was disbanded in 1958 after the promulgation of Martial Law. Tanzeem-e-Millat emerged on the political horizon of GB in 1970 but gradually disappeared by 1972. The other groups include Karakoram National Movement (KNM), Balawaristan National Front (BNF) formed by Nawaz Khan Naji in 1992 (it is split at the moment between Naji Group and Abdul Hameed Group), Balawaristan Students Federation (BSF), Gilgit-Baltistan United Movement (GBUM) and Gilgit-Baltistan Democratic Alliance (GBDA). The sub-nationalist

parties consider GB as an independent state, free from the sovereignty of Pakistan, India and even Kashmir.

According to Professor Manzoom Ali, the sub-nationalist ideas and movements have not come up without reason. They have nurtured by the mistakes committed by the government.²²⁷ Prolonged absence of fundamental rights in GB and lack of identity of the region within the federation of Pakistan has led to disillusionment for some people. According to Professor Manzoom Ali the sub-nationalist elements ‘have gone too far’. He believes that an independent and sovereign state based on GB would embroil it in another great game because of the interests of other countries. He suggested, ‘The best for the government of Pakistan is to take decision in the interest of Pakistan as well as the people of the GB region, and that is to take a bold decision and right away declare GB as the fifth province of Pakistan. The other four provinces should act as big brothers and help the younger brothers i.e. GB get its constitutional rights. The identity of the GB region should not be hampered by breaking it into various parts. It can serve best the interest of Pakistan if the GB kept as one homogenous federating unit.’²²⁸

Main Historical Documents

The main documents that explain the status of the GB region in historical perspective are as follows: the Treaty of Lahore, March 9, 1846; the Treaty of Amritsar, March 16, 1846; the Lease of Gilgit, 1935; the Return of Gilgit, 1947; the Karachi Agreement, April 28, 1949; the Decision of the AJ&K High Court, 1990; the Decision of the AJ&K Supreme Court, 1993; the Decision of the Supreme Court of Pakistan, 1999; and the Gilgit-Baltistan Empowerment and Governance Order, 2009.

Opinion of Political Leadership

Syed Mehdi Shah, Chief Minister of GB from 2009 to 2014, during an interview with the author, said, ‘Our forefathers had willingly decided to join Pakistan. We are more patriotic than people of any other provinces’²²⁹ He further said:

Our people want to get the status at par with the Punjab and other provinces. In the present status, we are not getting rights compatible with other provinces. The GBLA members do not

²²⁷ Manzoom Ali, 2016.

²²⁸ Ibid.

²²⁹ Syed Mehdi Shah, Chief Minister of GB from 2009 to 2014, Interview by author, Skardu, January 14, 2016.

get development funds as for MNAs or MPAs from other provinces. People want to pay taxes but only after Gilgit-Baltistan region is declared as constitutional province of Pakistan. After proper constitutional status, we will be able to speak in the National Parliament on the basis of equality.²³⁰

According to Syed Mehdi Shah, ‘In 1948, people thought that by joining Pakistan, the region would become prosperous. It has taken a long political and administrative journey but the dream of prosperity has not come true so far.’²³¹ With regard to human development in GB, Syed Mehdi Shah, Chief Minister of GB from 2009 to 2014, said, ‘After abolition of the Frontier Crimes Regulation (FCR) and change in governance system, the pace of human development in Gilgit-Baltistan accelerated but certainly not at pace with other parts of Pakistan.’²³²

Syed Mehdi Shah added:

We, the people of Gilgit-Baltistan, are Pakistanis. That is why our people have been bestowed upon Nishan-e-Haider and other awards, and that is why our mountaineers have been hoisting national flag on peaks above eight-thousand metres. We are using Pakistan’s national identity card, national flag and national anthem. Hence, we are Pakistanis by all definitions. We are more patriotic people than any other province of Pakistan.’²³³

Being asked as to why should GB not be part of Kashmir, Syed Mehdi Shah, Chief Minister of GB from 2009 to 2014, said, ‘As part of Kashmir, Gilgit-Baltistan would be at disadvantage due to small population size despite much larger territorial areas.’²³⁴

Haji Fida Muhammad Nashad, Speaker Gilgit-Baltistan Legislative Assembly said, ‘GB is not part of the state of Jammu and Kashmir but a part of the Kashmir dispute against the wishes of the people of GB’.²³⁵ According to Muhammad Sikandar Ali, Chairman Public Accounts Committee GBLA, ‘GB is part of Pakistan, not Kashmir. We believe that Kashmir is also part of Pakistan. If plebiscite on Kashmir

²³⁰ Ibid.

²³¹ Ibid.

²³² Ibid.

²³³ Ibid.

²³⁴ Ibid.

²³⁵ Nashad, 2016.

issue is held soon, we have no objection to participate in it but we do not want to delay our constitutional status as a constitutional province of Pakistan.’²³⁶

When asked as to what the view of the people of GB is with regard to plebiscite in Kashmir, Mr Sikandar Ali said, ‘100 percent people of GB would vote in favour of Pakistan. A few disgruntled elements have no value.’²³⁷ He further said, ‘It is good if Pakistan government can give complete constitutional status to GB, it would be better. If it cannot do that due to internal and external pressures due to linkage with the Kashmir issue, it should give GB a provisional provincial status with complete powers at par with other provinces of Pakistan.’²³⁸ Sikandar believes that Kashmir is the jugular vein of Pakistan but GB is not part of Kashmir nor can its constitutional status be delayed anymore. To this end, Ibrahim Sanai, the Minister for Information and Education in GB, said, ‘The Kashmiri people say, “Kashmir banay ga Pakistan” [Kashmir will become part of Pakistan]; we say, “We were, are and will remain part of Pakistan”.’²³⁹

The current constitutional status has serious implications. Yousaf Hussainabadi, a renowned intellectual from GB said, ‘I can see anger in the eyes of youth. I also see the leadership swapping into the hands of the third generation, which looks at various issues with emotions. If the matter of constitutional status is not resolved, matters may aggravate.’²⁴⁰ During academic discussions, some local scholars said that the current constitutional status fuels sub-nationalism. On this, Afzal Ali Shigri said, ‘Sub-nationalism is raising head because of constitutional status in limbo. If proper constitutional status is not given to GB, then the only linkage between Pakistan and GB is that of the UN Resolution on Kashmir.’²⁴¹ On the issue of sub-nationalism, Muhammad Sarwar, a native from Skardu said, ‘The sub-nationalists are nothing but a few unemployed young men. No sooner than they get some job, they raise the slogan: Pakistan Zindabad.’²⁴² According to Muhammad Ibrahim Sanai, the

²³⁶ Muhammad Sikandar Ali, member GBLA from Roundo and Chairman Public Accounts Committee GBLA, Interview by author, Skardu, October 28, 2015.

²³⁷ Ibid.

²³⁸ Ibid.

²³⁹ Sanai, 2015.

²⁴⁰ Muhammad Yousaf Hussainabadi, author, historian and research scholar, Interview by author, Skardu, March 14, 2015.

²⁴¹ Afzal Shigri, 2015.

²⁴² Mufti Muhammad Sarwar, a local scholar, Interview by author, Skardu, November 22, 2014.

Minister for Information and Education in GB, ‘Sub-nationalism cannot succeed in GB. We have a lot of divergences within: ethnic, linguistic, sectarian, cultural and historical etc. The best for use is to remain part of Pakistan.’²⁴³

The Issue of Self Rule

Self rule or self-governance is a system wherein people take their political, economic and social decisions themselves without external interference. According to Afzal Ali Shigri, self-rule or self-governance actually means that ‘the people should have say and representation in the governance and representative institutions’.²⁴⁴ Here he differs with the scholars, especially some from Kashmir, who believe that empowerment is not necessarily linked with representation, and if it was, Balochistan could have been the most empowered provinces of Pakistan. Indeed, but Balochistan has more say in the federal institutions rather than GB and AJ&K, which are represented by the Ministry of Kashmir and Gilgit-Baltistan Affairs. Afzal Ali Shigri believes that ‘self rule exists when people have representation where their fortune is being decided.’ The political opportunity structure of GB contradicts the notion of self-rule.

Effects of Geography and the Constitutional Status

With regard to the effects of geography on political security, Afzal Ali Shigri said, ‘The effects of geography become adverse with the current constitutional status’.²⁴⁵ It is true indeed. If a politico-geographic unit lacks governance authority, it cannot handle the geographic difficulties posed to human security.

Political security and constitutional status of GB is a complex and multidimensional issue. It encompasses thorough study and deeper understanding of the issue in historical perspective, geographical angle, relevant documents including treaties, accords, agreements, court decisions and UN resolutions, and above all, the aspirations of the people of GB. An understanding of the opinion of the people of Kashmir and the people of Pakistan at large is also vital to understand the issue and arrive at correct conclusions. Granting provincial status to GB is a popular public demand in the region. It has to be seen in two contending perspectives: (1) Would the

²⁴³ Sanai, 2015.

²⁴⁴ Afzal Shigri, 2015.

²⁴⁵ Ibid.

federation of Pakistan be able to take a U-turn from its stated position i.e. GB's political destiny is linked with Kashmir; and (2) Would the government be able to disregard the opinion of the people of GB? The Kashmir issue itself is in an uncertain position. This has kept the constitutional status of GB in limbo for the last about seven decades. It has only served the cause of human insecurity based on political deprivation both in Kashmir and GB. Today, the people of GB lack national identity despite the fact that they use the Pakistani national identity cards and passport. The constitution of Pakistan does not consider GB as part of the federation in any way.

On the whole, geography has played a definitive role in political security throughout the political history of the region. Its current constitutional status, too, has a strong linkage with geography. GB was invaded by Dogra regime of Jammu and Kashmir due to geographic proximity. Its linkage with the UN resolutions on Kashmir is, thus, also a product of geography. GB's constitutional status and political security falls in the domain of national governance. However, technology has less to do with it as a thread of geo-humanism.

Economic Security

Geography plays the foundational role in economic security of Gilgit-Baltistan. The key facets of GB's economy are agriculture, trade, tourism and mountaineering, minerals, wildlife and water economy. The agricultural sector includes main crops, fruits (both fresh and dry), livestock, fishery and forestry. Trade implies local, national and regional trade. The household economy is also supported by the job market, which includes both public and private sector employment.

Agriculture

Agriculture remains the mainstay of economy. This denotes that majority of people in GB depend on agricultural income for subsistence and sustenance. Agriculture takes many shapes to include: crops cultivation, animal husbandry, fishery, social forestry (comprising both fruit and non-fruit trees),²⁴⁶ agro-forestry and

²⁴⁶ The term social forestry was by the National Commission on Agriculture in India in 1976. Later, FAO introduced the term community forestry in 1978. The purpose in both cases was to motivate the rural communities to plant forests near their settlements to meet fuel, fodder, agricultural implements, fruit and energy needs so as to reduce pressure from the natural forests. Besides a host of other sources on the subject, sufficient details may be found in Himadri Sinha, *People and Forest: Unfolding the Participation Mystique* (New Delhi: Concept Publishing Company, 2006), 174. The types of trees in social forestry vary from region to region.

urban forestry.²⁴⁷ It is important to note that even the people having non-agricultural occupations as their main source of income do have linkage with agriculture in one form or the other. Only about 4 to 5 percent people in GB are landless but most of them are linked with agriculture in other forms such as livestock.²⁴⁸ In GB's socio-cultural system and economic opportunity structure, there are no *hari* or *muzaira* nor are there any 'low castes' unlike Punjab, Sindh, Balochistan and Khyber-Pakhtunkhwa. One of the reasons is that there is no surplus land to lend or rent out to someone else for agricultural processes. Agriculture supports the basic household economy, especially in rural areas of GB. This means that the rural economy is entirely a product of geography. Agricultural dividend of geography has been covered in the sections on food security.

Minerals

The GB region is home to abundant mineral resources such as gold, copper, platinum, cobalt, palladium, lead, zinc, nickel, bismuth, molybdenum, arsenic and iron ore. GB is also home to precious gemstone such as topaz, aquamarine, ruby, epidote, tourmaline, pargasite, emerald, spinal, moonstone, zircon, garnet, amethyst and morganite, and other metallic and non-metallic minerals. The industrial minerals such as marble, china clay, feldspars and serpentinite are also found in GB in abundance.²⁴⁹

The GB region has minerals worth billions of dollars. However, the region lacks a politico-administrative oversight which may benefit not only the GB government but also the general populace. So far, only the miners are being benefited. To what extent, nobody knows. Most of the exploration and excavation is being done without proper permits from the relevant department. Figure-18 shows local mines for gemstone extraction in Braldu valley of Shigar district. Ministerial sources and the people involved in the gemstone business told the author that mining is carried out both in legal and illegal forms.

²⁴⁷ Agro-forestry includes multipurpose trees, horticultural plants and crops. Urban forestry includes fruit, flower and shade bearing trees in urban areas including along the road. G.V.S. Lakshmi, *Methods of Teaching Environmental Science* (New Delhi: Discovery Publishing House, 2004), 119 contains brief details on the issue.

²⁴⁸ Nazir Khan, Manager, Agha Khan Rural Support Programme (AKRSP), Skardu, Interview by author, Skardu, January 11, 2016.

²⁴⁹ "Mineral Sector of Gilgit-Baltistan," *Government of Gilgit-Baltistan*, www.gilgitbaltistan.gov.pk/DownloadFiles/InvestmentPotential/Minerals.pdf (accessed May 11, 2016).

Figure-18: Local mines for extraction of gems in Braldu valley of Shigar district.



Source: Snapped by the author; March 26, 2015.

One of the miners said, ‘We will not get any permit and will not pay taxes till such time that GB is declared a constitutional province of Pakistan’.²⁵⁰ It is also of note that crude methods with indiscriminate blasting techniques are being used for excavation of minerals including gemstones, which not only destroy this natural resource but, according to official sources, also result wastage of more than 75 percent of the total yield.²⁵¹

Minerals and gems including gold have been excavated in GB for centuries. To this end, the Imperial Gazetteer of India notes, “Many of the streams are rich in gold, especially those flowing from the great Rakiposh [sic] mountains, and it is probable that a scientific search for minerals would be well repaid. Gold-washing is only practised by the poorest in winter, but is sometimes very remunerative, the best of gold being of 20 carats.²⁵² This note comes down from a 19th century gazetteer. The situation has not changed significantly. No scientific research has been carried out to discover gold or any other minerals. Crude methods continue to be used for extraction

²⁵⁰ Name not being given herein due to the condition of anonymity.

²⁵¹ “Mineral Sector of Gilgit-Baltistan.”

²⁵² Hunter, 77-81.

of all kinds of minerals. Gold-washing by the poorest continues virtually in many rivers and streams of GB. Figure-19 shows a family busy in gold-washing. Actually, all members of a family must work the whole day to extract the amount of gold good enough to support the routine expenditures of the family.



Figure-20 shows how much gold in a day a household (a combined family of 14 persons including women and children) has extracted shown by the family head to the author.



It has a value of just about a couple of thousands rupees (just about \$20). However, it is luck of a person or household as to how much they find in a day. But certainly, it is yet to attract the attention of the government or big firms. A family normally washes about 1,000 kilograms of sand daily. A survey conducted in 1998 revealed that local gold-washers extract about 15 kilograms gold annually from the entire GB region.²⁵³ The government claims that the latest technique of mechanized gold recovery system is now available that can process from 5 to 50 tons per hour of placers with ensured safe recovery of gold along with other metals like titanium, gems, magnetite etc.²⁵⁴ However, during field work, the author saw the primitive techniques still being used in Braldu River in Shigar district and Nagar River in Nagar district of GB.

The GB government claims to have adopted the National Mineral Policy (NMP) of Pakistan. NMP is not being implemented in letter and spirit even in other parts and provinces of Pakistan. The mining sector contributes less than 1 percent to Pakistan's GDP.²⁵⁵ The government institutions and officials handling Reko Diq and Saindak gold and copper mines affairs in Balochistan have faced scepticism and corruption charges during the recent years. The record of efforts for discovery of oil and other natural resources in various parts of the country has been quite bleak. Another issue pertaining to the mining sector is limited private sector investment even though GB government has given a lot of tax concessions. Table 5.1 contains details.

| Type of Tax | Other Provinces | Gilgit-Baltistan |
|----------------------------|--|------------------|
| Corporate Profits Tax | 35 percent (public), 45 percent (private) | Nil |
| Dividend Withholding Tax | 7.5 percent adjustable | Nil |
| Royalties on Production | 1-10 percent | 1 to 10 percent |
| Property and Asset Taxes | 2 percent Capital Value Tax | Nil |
| Value Added Tax | 15 percent GST | Nil |
| Surface Rents / Title Fees | Annual, nominal | Annual, nominal |
| Customs Duties | 10 percent | Nil |
| State Equity Participation | Yes | Not mandatory |
| Excise Duties/ Labour | Yes | Nil |

²⁵³ "Mineral Sector of Gilgit-Baltistan."

²⁵⁴ Ibid.

²⁵⁵ Government of Pakistan, "National Mineral Policy - 2013," *Ministry of Petroleum and Natural Resources, Islamabad, Pakistan* (February 2013): i.

| | | |
|--|----------|------------|
| Welfare | | |
| Electricity | Costlier | Economical |
| Source: “Mineral Sector of Gilgit-Baltistan,” <i>Government of Gilgit-Baltistan</i> , www.gilgitbaltistan.gov.pk/DownloadFiles/InvestmentPotential/Minerals.pdf (accessed May 11, 2016). | | |

Tourism and Mountaineering

Tourism and mountaineering is an important strand of GB’s economy. All ten districts of GB possess abundant tourism potential. It is completely a geographic dividend, a manifestation of geo-humanism. Tourism in GB has two main sectors: general tourism and mountaineering. Mountaineering also includes trekking. Tourism and mountaineering potential of GB is yet to be fully explored. However, it is gradually picking up. During 2015, some 0.8 million tourists visited GB during the summer season. It is actually linked with overall security situation in the country. People in other parts of the country are gaining confidence and visiting GB increasingly. This has given some boost to the local tourism industry, including hotels, guest houses and tourism companies.

Mountaineering can be a rewarding sector if developed and facilitated. Table 5.2 shows the royalty fee for the Year 2015 for foreign mountaineers. Ostensibly, it is a good amount but the number of mountaineers is far below the actual potential. Nepal, a peer country in mountaineering capacity, is rather better. Hassan Sadpara, a famous mountaineer of Pakistan hailing from Skardu, said, ‘Enhanced mountaineering activities will have a positive effect on the economy of GB as well as Pakistan as a whole. In many other countries, people pay even for climbing 6,000 m high peak. So many countries do not have even a single peak as high as 6,000 m. There trekkers and mountaineers need to come to Pakistan to ascend these peaks.’²⁵⁶ He also said, ‘GB can earn more than its present budget only from mountaineering if it is fully developed including availability of communication facilities and appropriate security.’²⁵⁷ Muhammad Hussain Abis, a local trekker from Gultari, Skardu said, ‘If tourism including mountaineering in GB is fully developed, GB can provide financial resources to the federation rather than receiving from it.’²⁵⁸ It is true. Tourism and

²⁵⁶ Hassan Sadpara, famous mountaineer of Pakistan, Interview by author, Skardu, February 15, 2016.

²⁵⁷ Ibid.

²⁵⁸ Muhammad Hussain Abis, a local mountaineer from Gultari Skardu, Interview by author, Skardu, February 15, 2016.

mountaineering can generate a lot of economic activities at all three levels – macro, meso and micro.

Hassan Sadpara further said:²⁵⁹

The mountaineering opportunities in Pakistan are more than any other country including Nepal due to the peaks located in GB. The trekking opportunities, too, are more than any other countries. There are so many peaks, high mountain passes and glacial lakes suited for mountaineering and trekking both for long and short trips. But, Pakistanis lack financial resources even to explore and correctly map the area. Nepal is better in these opportunities.

According to Ashraf Aman, a senior mountaineer from GB, ‘Tourism generates economic as well as mental development. People learn from each other.’²⁶⁰

| Serial | Height of Mountain | Full team of Seven members | Each Additional member |
|--|---------------------------|-----------------------------------|-------------------------------|
| 1. | K-2 (8611 M) | US \$7200 | US \$1200 |
| 2. | 8001-8500 M | US \$5400 | US \$900 |
| 3. | 7501-8000 M | US \$2400 | US \$300 |
| 4. | 7001-7500 M | US \$1500 | US \$180 |
| 5. | 6501-7000 M | US \$900 | US \$120 |
| Environment Fee/Waste Management Fee will be 68 US\$ for each member of mountaineering expedition. Trekking Fee will be 50 US\$ per person for one month. However, 50 US\$ will be charged as Waste Management Fee per person for one month. | | | |
| Source: GB Council Notification No.T-5(1)/2013-GBC dated January 16, 2015 | | | |

Pakistan has unique mountains. According to Ashraf Aman, ‘Mount Everest can be climbed by the novices. It takes about \$4000. The Nepali Sherpas take along oxygen cylinders with the climbers. In case of K-2, even billions of dollars cannot work. One has to be a climber to summit it. That is why it is called the Mountain of the Mountaineers.’²⁶¹ Because of this reason, accomplished mountaineers look towards the mountains of Pakistan in GB. Ashraf Aman also said, ‘Nepal facilitates mountaineering activities the most. Nepal has three seasons of mountaineering: Winter, summer and autumn. During monsoon season in July-August, there is no mountaineering activity in Nepal due to heavy rainfall.’²⁶²

²⁵⁹ Ibid.

²⁶⁰ Ashraf Aman, mountaineer, adventurer and Vice President Alpine Club of Pakistan, Interview by author, Gilgit, November 28, 2015.

²⁶¹ Ibid.

²⁶² Ibid.

On the other hand, summer is the primary mountaineering season in Pakistan. June 15 to August 15 is a good period for mountaineering. K-2, the second highest peak in the world located in the Karakoram Mountains of GB in Pakistan, was successfully climbed for the first time by an Italian expedition on July 31, 1954. However, Broad Peak has been climbed once during winter on March 5, 2013, Gasherbrum I on March 9, 2012, Gasherbrum II on February 2, 2011 and Nanga Parbat on February 26, 2016. K-2 is yet to witness a winter summit. As a matter of fact, all peaks above 8,000m, except K-2, have had winter summits.

There are many countries that do not have mountain peaks like Pakistan but they have mountaineering schools. Pakistan has five out of 14 eight-thousanders in the world, 29 peaks over 7,500m and 108 seven-thousanders, a large number of five and six-thousanders, most of them located in GB, but has no mountaineering training institutes. There is a room to establish two to three mountain institutes in Pakistan. Gilgit and Skardu should have at least one each. In addition to contributing to economic sector, tourism also works to win the goodwill of people from other countries. To this end, Sahib Irfan, a tour operator in GB said, ‘Mountaineers and tourists, after going back from Pakistan to their country of origin, project a positive image of Pakistan through their books and other publications, an image that otherwise does not exist.’²⁶³

The history of mountaineering is as old as that of the humankind. The first mountaineer was Prophet Adam (Peace be Upon Him) whose footprint, according to a tradition, is found on Mount Adam in Sri Lanka. Prophet Musa (Moses; Peace be Upon Him) climbed Mount Sinai. Prophet Muhammad (Peace be Upon Him) climbed Mount Hira and lived in the cave of Hira, where the Holy Quran was revealed to him. Tourism and mountaineering would live on. GB can benefit from it manifold. Nevertheless, there are numerous hurdles. In first place, GB still suffers from remoteness due to weak communication linkage with other parts and provinces of Pakistan. Road journey takes about 18 to 19 hours from Islamabad to Gilgit, and more than one day from Islamabad to Skardu.

Only one airliner – PIA – is operating between Islamabad and Gilgit / Skardu. Nearly 50 percent flights are cancelled due to inclement weather and technical issues.

²⁶³ Sahib Irfan, Manager Adventure Tours Pakistan (ATP), Interview by author, Gilgit, November 28, 2015.

Hence, access to GB is really uncertain during all seasons. Every year, there are instances when GB is closed to the outside world for days and even weeks due to closure of the Karakoram Highway as well as suspension of the air transport. Thus, tourists from other parts of Pakistan often prefer to go to other destinations such as Naran, Kaghan, Swat, Murree and AJ&K. Likewise, the foreign tourists also look for other international destinations.

In some of the valleys located in single-crop zone, tourism, trekking and mountaineering are the main sources of income. These include Hushe valley in Ghanche district, Braldu valley in Shigar district and Shimshal valley in Hunza district. In contrast to Nepal where the tourists and mountaineers are facilitated, foreign mountaineers in GB have a lasting complaint that the official oversight and security related processes delay their plans. The pressure of official processes and hurdles goes down to the local communities. Gondogoro La is a case in point. According to Haji Muhammad Hussain, '95 percent of Hushe village's economy has been dependent on tourism and trekking across Gondogoro La (Pass). It is no more. The foreign trekkers are not coming to cross the pass due to the official proviso to take along a military liaison officer just like mountaineering groups.'²⁶⁴

Haji Hussain has a point. The local income has been seriously affected due to this issue. Due to influx of Pakistani and foreign tourists, trekkers and mountaineers in the valley, especially for going to Gondogoro La and beyond, Masherbrum Base Camp, Masherbrum La and Masherbrum Peak, the entire village has been professionalized into mountaineering. There are some 18 Hushvis who have been on the summit of one or more peaks about 8,000 m; some of them have climbed 4 or 5 such peaks. Little Karim, Hassan Jan, Haji Rozi Ali, Muhammad Taqi, Ghulam Mehdi, Rozi Ali, Muhammad Yousaf and Muhammad Iqbal are a few to name that the author met and had fruitful discussion with, during the course of research. Several people of the village have been on the Gondogoro top. Many of them are high altitude porters. Indeed, all and sundry from the village, including women and children, frequently visit Gondogoro La and Masherbrum La for rearing their cattle and wood collection. So mountaineering is their way of life rather than just a profession or pastime.

²⁶⁴ Haji Muhammad Hussain, Ex Chairman, Union Council Machlu (Hushe valley), Interview by author, Hushe village, Khaplu district, February 21, 2016.

There are other such valleys, too, like Basha and Upper Braldu valleys in Shigar district and Shimshal valley in Upper Hunza. To this end, Muhammad Hussain Jafri, a native from the Upper Braldu valley said, ‘Upper Braldu valley is a single crop zone. There are no fruit trees. Some 98 percent people earn their living by acting as tourism guides and porters.’²⁶⁵ Many people from these valleys breed horses and mules for providing transportation and carriage services to the tourists, trekkers and mountaineers. There is a problem herein too. Full and timely payment is not made to the local porters and tourism guides. The middlemen, agents, contractors and companies eat up significant part of the share of individual porters and workers.

For instance, ABC Trekking Company is hosting 20 foreign mountaineers. They have to stay and subsist over the Baltoro glacier and in Upper Braldu valley for one to two months. The company hires the porters and animals e.g. for a month. The problem lies herein. The middlemen get contract and eat up money of the poor porters and horse owners. For example, if actual amount of a trip received by the company from the foreign tourists or mountaineers for a porter is Rs 10,000 (approximately US \$100), the contractor, agent or the middleman receives Rs 8,000 from the company and pays only about Rs 6,000 to the porter. This is how many people in the chain earn except for the porter who receives nearly half of what he deserves. Delayed payment is yet another issue. The porters and horse owners continue to look for payment for months and sometimes even more. During a trek over Baltoro Glacier, the author had detailed discussion with over three dozen porters at Concordia. They had a lot of complaints with regard to the amount of wages and delayed payment.

According to Mirza Ali and Samina Baig, famous mountaineering siblings from Hunza, there are no restricted zones for mountaineers on any of the seven continents except for India and Pakistan.²⁶⁶ With regard to facilities and environment, they said, ‘Looking at private sector such as tour operators we need to encourage more people. Compared with Nepal where there are more than 8,000 tour operators, Pakistan has hardly 80. But the number of mountaineers attempting Mt. Everest is more than 1000 per season, whereas hardly 200 to 300 mountaineers visit Pakistan.’ Actually, all this points to the environment which the mountaineers from different

²⁶⁵ Muhammad Hussain Jafri, Teacher, Government Primary School Askoli, Braldu valley, Shigar district, Interview by author, Askoli, January 19, 2016.

²⁶⁶ Mirza Ali and Samina Baig, famous mountaineering siblings from Hunza, Interview by author, Hunza (via WhatsApp), March 28 2016. Mirza Ali is the Founding President at Pakistan Youth Outreach and Founder and CEO at Karakoram Expeditions.

countries face. According to Muhammad Ali Sadpara, a famous mountaineer from Sadpara valley in Skardu district, ‘Nepal has much better atmosphere for mountaineering than Pakistan. There is a need to resolve the problems faced by the mountaineers at priority. This would work to attract more of them to GB.’²⁶⁷

In sum, the government just needs to provide an enabling environment. The rest should be left to the private sector driven enterprises. If done, this sector would greatly support GB’s economy at all three levels – macro, meso and micro.

Trophy Hunting

Trophy hunting is another area that to a certain extent boosts the local economy. The International Union for Conservation of Nature and Natural Resources (IUCN) introduced the idea of trophy hunting of markhor, blue sheep and Himalayan ibex. This programme started in 1980s and is carried out under the Convention on International Trade of Endangered Species of Wildlife. It is permitted only in the areas notified by the Park and Wildlife Department of GB government. The government assigns the areas to the hunters purchasing permits according to the known number of these animals in given areas and the size of community so that all communities can benefit from the programme.

Within the GB government, the Parks and Wildlife Department controls and regulates trophy hunting. There are separate rates for foreigners, Pakistani nationals and the residents of GB as shown in Table 5.3.²⁶⁸ The rates are reviewed for every hunting session before allotment of trophy permits, which is spread over six winter months from October to April.

| Table 5.3: Trophy Hunting Rates in GB. | | |
|---|-----------------------|---|
| Serial | Type of animal | Rates |
| (1) | Markhor | US \$60,000 |
| (2) | Blue sheep | US \$8,000 for foreigners US \$4,000 for Pakistani nationals |
| (3) | Himalayan Ibex | US \$3,000 for foreigners Rs 100,000 (US \$1,000) for Pakistani nationals Rs 50,000 (US \$1,000) for GB residents |
| Source: Parks and Wildlife Department, Government of Gilgit-Baltistan. | | |

²⁶⁷ Muhammad Ali Sadpara, famous mountaineer from Sadpara valley of Skardu district, Interview by author, March 7, 2016. Muhammad Ali Sadpara is the first ever human being in the world to have reached the summit of Nanga Parbat (8,126m), the ninth highest peak in the world, during winter. He did that on February 26, 2016.

²⁶⁸ Letter issued by Conservator Parks and Wildlife Department, Gilgit-Baltistan, for hunting session 2014-2015, www.gilgitbaltistan.gov.pk/DownloadFiles/TrophyHunting.pdf (accessed March 11, 2016).

According to the concept of trophy hunting, these animals have been given into the custody of the local communities. 80 percent share of the trophy permits goes to the local community whereas the remaining 20 percent is spent by the government on schemes like preservation of pastures and forests, and conservation of biodiversity. Some people think that perhaps these animals fall into the category of endangered species. Not so. Because of community custody, two things have been curbed considerably: group hunting in rural areas and poaching by hunters from outsiders.

Group hunting in rural areas was called *Dam Daro* (in the Shina language). This meant encircling and cordoning the animals such as ibexes, markhor, blue sheep, musk deer and even partridges by the people of the village. They used to do this either on the directive of local Rajas or for their village. After giving major share to Raja family, the meat used to be distributed among the people of the village. According to a senior wildlife officer, even in mid-1990s, the communities of the Khunjab National Park complained that there was pressure on their pastures due to increasing number of wildlife species, and that they were feeling short of grass and fodder for their domestic animals.²⁶⁹

Actually, the number of animals was decreasing fast due to group hunting before the introduction of the community custody programme. However, poaching is still reported in some areas of GB, though less frequently. Not all but some of the poachers are arrested by police if reported by the Parks and Wildlife Department. For instance, a person from Tistey village in Upper Braldu valley of Shigar district was apprehended by police and was being tried for poaching in the court of law in February 2016.²⁷⁰ Another person, Noor Khan by name, was apprehended by police for unlicensed hunting in Bar Valley of Nagar district on April 13, 2015. His gun was confiscated and he was sent to jail.²⁷¹

At any rate, the trophy hunting programme adds to the economic security of local communities at a micro level. During the year 2014-2015, the GB government set the quota for trophy hunting at 64 animals: four markhors, 52 ibexes and eight

²⁶⁹ Khadim Hussain, Senior Wildlife and Forest Officer, Interview by author, Skardu, November 22, 2015.

²⁷⁰ Muhammad Ali, a farmer and tourist guide from Upper Braldu valley of Shigar district, Interview by author, Upper Braldu, February 23, 2016.

²⁷¹ "Without a licence: Man arrested for illegally hunting in Gilgit-Baltistan," *The Express Tribune*, April 14, 2015.

blue sheep.²⁷² Local communities willingly assist the trophy hunter to set economic benefit. The author witnessed a trophy hunting event on February 21, 2016 in Hushe valley of Ghanche district. One of the ibexes from the herd shown in Figure-21 was shot by a trophy hunter, who had purchased a permit from GB government. The hunter was a resident of GB.

Figure-21: A herd of ibexes in Hushe valley near the junction of Masherbrum Pass and Gondogoro Pass.



Source: Snapped by the author on February 21, 2016.

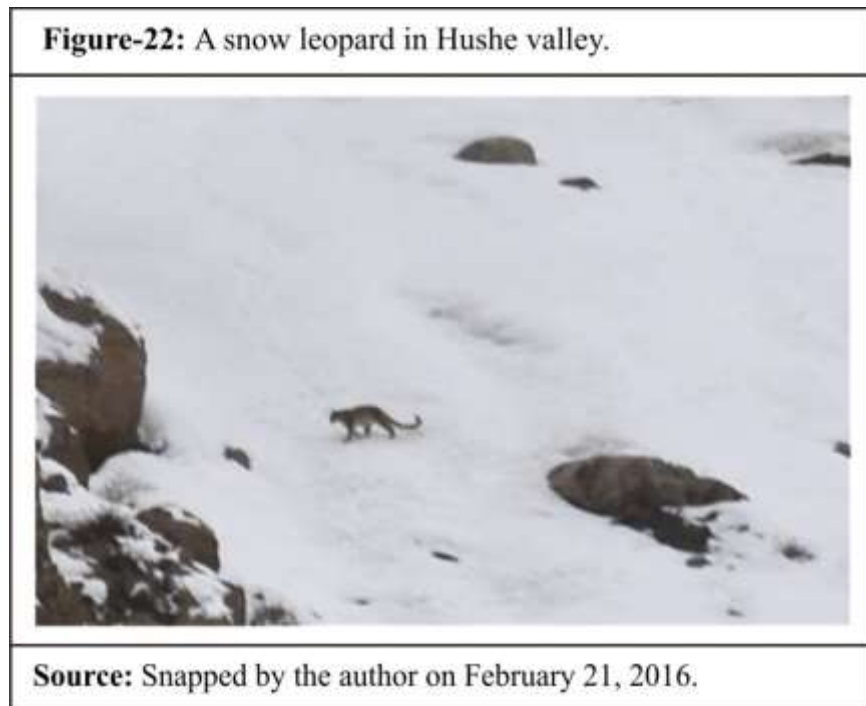
Some of the animal species in GB are endangered. Himalayan brown bears are found over Deosai Plains. They were at the verge of extinction – only about 17 were left – when the Deosai National Park was established in 1993. After strenuous efforts by the wildlife department against poaching, the number of bears started rising and were found to be over 70 during the census in Fall 2015. Its trophy hunting or poaching is not allowed.

The snow leopard (*Panther uncia*) is another endangered species. It is listed as endangered on the IUCN Red List of Threatened Species.²⁷³ Earlier, poaching of snow leopards was common. Since 1990s various organizations are working on the preservation of snow leopards. Baltistan Wildlife Conservation and Development Organization (BWCDO) based in Skardu, headed by Dr Shafqat Hussain and Ghulam Muhammad Sadpara is one such organization. It is a sort of leader in the field of conservation of this species. Snow leopards are found in various areas of Baltistan.

²⁷² Ibid.

²⁷³ The IUCN Red List of Threatened Species. Version 2015-4, www.iucnredlist.org (accessed March 11, 2016).

The author sighted and snapped a snow leopard a few kilometres north of Hushe village in Ghanche district. It was seen on the western side of Hushe River near the junction of Masherbrum Pass and Gondogoro Pass. Figure-22 bears an image. It was the dusk time and the distance was about 700m.



Banking Sector

According to a bank official, ‘Geography and communication system affect the banking system to a great extent. Salary of the government official in remote areas is often delayed by 2 to 3 days, and at times even more. New currency notes do not reach the area on time on various festivals including Eid.’²⁷⁴

Trade

GB does not have a manufacturing sector. There are hardly any manufacturing units. However, it is moderately rich in trade of different kinds, both inland and with China. The main items of trade include fresh and dry fruits, livestock, milk products and minerals. The existing trade level is not enough to support GB’s economy to the extent of self-reliance. It needs to be boosted. More than trade to and fro, the GB region can earn better by becoming a trade transit zone as in the past. The prospects

²⁷⁴ Ghulam Muhammad, Manager Askari Commercial Bank Skardu, Interview by author, Skardu, January 21, 2016.

are promising as part of the China Pakistan Economic Corridor (CPEC). GB is located at the head of CPEC section in Pakistan. In addition to China across Khunjrab Pass, GB can also serve as a link with Central Asia, Afghanistan, Chitral, AJ&K and Ladakh region.

Job Market (Public and Private Sector Employment)

The public sector is the largest employer in Gilgit-Baltistan. Some 42,000 people are government employees in the region. The private sector is virtually non-existent except for a NGOs and private schools etc. Job market can thrive if tourism, trekking and mountaineering activities are enabled by the public sector. CPEC would also boost the job market in the private sector.

For the most part, economic security in GB is a function of geography. Good governance and application of modern technology are direly needed to boost the geography.

Food Security

Food is essentially a dividend of geography. Food security is defined by the Food and Agriculture Organization (FAO) of the UN as: ‘The condition when all people, at all times, have physical access to sufficient, safe and nutritious food to meet dietary needs and food preferences for an active, healthy life.’²⁷⁵ Food security itself is a multidimensional subject. Viewed on the larger map of food security, GB today suffers from food insecurity purely because of geography. The fault lines of food security governance further add to the problems.

In rural areas, almost each household has a house to live in and land to cultivate. It is considered bad to sell land. However, in urban areas such as Gilgit, Skardu and other district headquarters, some families do not have agricultural land but each family unit has a house. However, almost 70 to 80 percent households even in Skardu city have milk animals; cows or goats etc. In rural areas, each household has more than one milk animals.²⁷⁶ In olden times, each household used to produce sufficient food for the coming year, which provided food security. Now, the trends are

²⁷⁵ Tawah Mentan, *Africa: Facing Human Security Challenges in the 21st Century* (Mankon, Cameroon: Langaa Research and Publishing CIG, 2014), 90.

²⁷⁶ Ghulam Muhammad, General Manager, Baltistan Wildlife Conservation and Development Organization (BWCDO), Interview by author, Skardu, January 21, 2016.

changing. Some people have shifted to cash crop of potato in many areas. Potato gives money but the household remains short of some of the food items like food grains. Thus, they look to the government to provide wheat at subsidized rates.

About six percent of the total area of GB is under cultivation, while the remaining is either glaciated or uncultivated high mountains and forests which provide timber and food to the livestock. About 80 percent of the cultivated area is being used for food grains and other arable crops while 20 percent is under fruit plantation.²⁷⁷ The local food production in GB is not enough to meet the requirement of the population, and the deficit is met by bringing the food items from other parts of Pakistan, especially the Punjab. According to Afzal Ali Shigri, ‘food grain has always been short in GB and will remain so’. Muhammad Yousaf Hussainabadi also believes that GB can never be self-sufficient in food due to the impediments of geography and climate. The case of Ladakh region in Indian Occupied Kashmir (IOK) is similar where the food items are imported from the Indian province of Punjab. Now, even a part of the animal fodder in GB is being brought in from the Punjab. Professor (emeritus) Manzoom Ali also believes that ‘self sufficiency in food is not possible in the GB region. Food dependency on other regions e.g. Punjab will continue’.²⁷⁸

The inhabited elevation of GB has three zones of cultivation. It is purely a function of geography. The elevations lower than 1,900m are known as the Double Crop Zone. Wheat is the winter crop while maize is the summer crop. At the lowest elevations, some short season crops are sown as the third crop. The areas such as Chilas and Gilgit fall into this zone. The sowing season starts on February 21, (or before) and goes up to October-November. The elevations from 1,900m to 2,300m are called the Marginal Double Crop Zone. They can be turned into proper Double Crop Zone by sowing season crops and early maturing varieties. The middle elevations such as Skardu, Roundo, Kharmang, Astore, Shigar, Khaplu, Lower Hunza, Gahkuch and Gupis etc are part of this zone. Wheat, buckwheat, barley, potato and various varieties of vegetables are sown as main crops. The sowing season starts around March 21 (or before) and goes up to October.

²⁷⁷ M. Akmal Khan, “Food and Nutrition Situation in Northern Areas of Pakistan,” *Allama Iqbal Open University*, Islamabad, aiou.edu.pk/FoodSite/Research%20Papers/scan0002.pdf (accessed March 26, 2016).

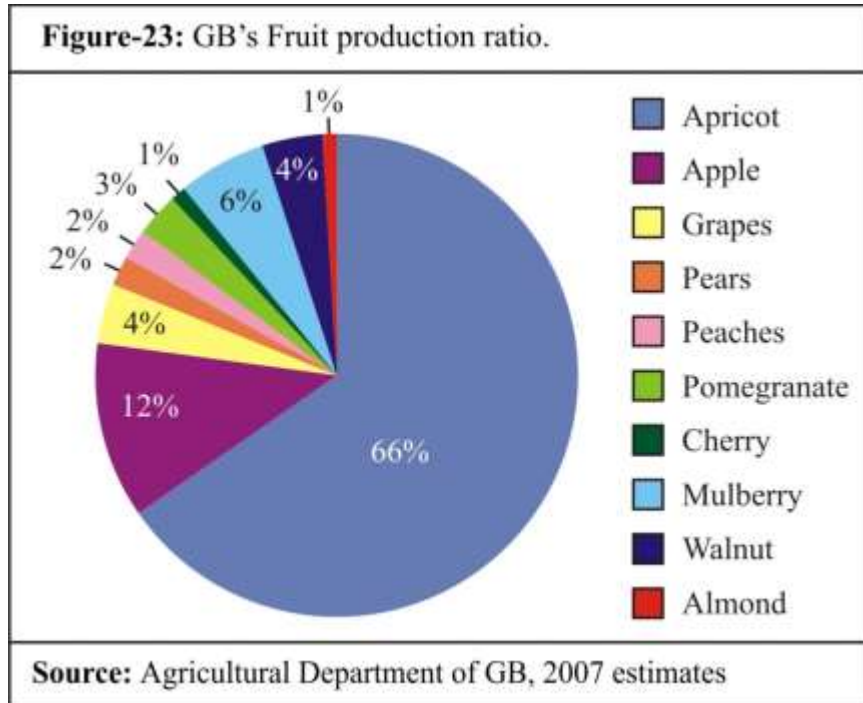
²⁷⁸ Manzoom Ali, 2016.

The elevations from 2,300m to above 3,000m make up the Single Crop Zone. Potato, wheat, barley, bean and various kinds of vegetables e.g. peas and turnip are grown in this crop zone. The cultivation season starts around April 21 and goes up to September. This denotes that these upper elevation communities have less than half a year for to grow food. This crop zone is made up of areas like Hushe valley in Ghanche district, Basha and Upper Braldu valleys in Shigar district, Phander, Shandur, Upper Yasin, Ishkoman and Karambar valleys in Ghizer district, and Chipurson, Khunjrab and Shimshal valleys in Upper Hunza. All these are located above 3,000m. Gultari and Matiyal valleys in Skardu district, and Minimarg areas of Astore district, being cut off from main towns for five to six months due to closure of Burzil Pass also suffer from cultivation difficulties beside various other human insecurity shocks.

GB is the northern fruit basket of Pakistan. Numerous varieties of fresh and dry fruit are grown in GB such as apricots, cherries, walnuts, almonds, grapes, pears, peaches, plums, pomegranates, mulberry, figs and blue berries. These fruits are locally consumed besides being exported to other areas.

Apricot is the fruit of primary significance in GB and is grown in abundance in all valleys with the exception of a few upper valleys, some of which are located near the snout of glaciers e.g. Arandu and Upper Braldu in Shigar district, and Chipurson valley located in Upper Hunza. Apricot has been the mainstay of food in GB for centuries. It had been used as an item of regular meal rather than an 'extra'.²²

Apricot still serves as the main source of oil used for various purposes including cooking and medicinal needs. Every part of the apricot tree in GB is useful: it is eaten as a fruit and as regular meals both in hydrated and dehydrated forms; its wood is used as fuel when the tree is too old to bear fruit; its leaves are used as cattle and sheep fodder; its kernel is eaten as a dry fruit as well as used as an oil source; and the wooden case of the kernel is used as a fast-burning fuel in winter. Apricots amount to almost two-thirds of the total produce of fruit in GB. Figure-23 contains details.



On the whole, fruit has been an essential part of GB's culture for centuries and remains so. Likewise, it has played a significant part in the food security of people of GB and continues to do so. Fruit has been the backbone of GB's agricultural income since time immemorial. GB's fruit has been exported to the adjoining geographic regions including Yarkand in Xinjiang, Ladakh, the Vale of Kashmir, Hazara, Malakand and Chitral, Badakhshan province of Afghanistan and Central Asia. Both these fruit types and the export regions have been the dividends of geography. However, geography has also proved to be an impediment in a manner that, surrounded by the highest watershed in the world, GB is strongly landlocked.

Development of communication to and from GB is barred by geographic barriers and climatic conditions besides the fault lines of governance. Even today, a lot of fresh fruit is wasted and perishes before it reaches the market in other parts and provinces of Pakistan. Most of the dry fruit, however, reaches the market without loss. Some of the fresh fruit is dried up and sold. Nevertheless, the dehydration process is also mainly non-scientific except for a few plant units provided by the Agha Khan Rural Support Programme (AKRSP) to various communities, which may be considered better than the crude methods.

The agricultural sector of GB is also home to a lot of livestock. Main categories of livestock are yak, cattle, buffalo (on lower elevations), sheep, goat and domestic fowl to meet the requirements of meat, milk and eggs. Horses, mules and

donkeys are also raised for the purpose of conveyance and carriage, and for tourists and mountaineers in some valleys. Horses are also raised for playing polo. All these species are actually bred on geography, and are thus a glimpse of geo-humanism. Sufficient natural fodder is available in the region especially during summer.

Every village has one or more pastures. These grazing areas are well defined between the villages and communities. Where they adjoin, there is proper demarcation, at some places in the form of stone walls. Conflicts, if any, are resolved by the elders of the communities. Abundant water is available to support breeding livestock. Most of the animals are sent up to the village pasture often during the month of May and June depending on the elevation of the village and pasture. Various people of the village are assigned the responsibility to rear the cattle, sheep and goats on a turn basis. The milk cows and the sick animals undergoing treatment are kept in the village. March and April are the toughest months for the village dwellers when the stocks of food grain come to an end and animal fodder also draws to a close. Under such circumstances, people help each other selflessly.

Livestock manifests food security, economic security and culture. Some of the valleys have comparably more livestock. For instance, Basha valley in Shigar district literally means the 'Valley of Meat' in the Balti language. Due to large size pastures, a large amount of livestock is bred, especially yaks and goats, and sold out of the valley. Livestock is also a trading stuff between communities. It is a means of barter trade between Chipurson valley of Hunza district and Iskhoman valley of Ghizer district with the Wakhi communities living in Afghanistan and Tajikistan. Goat is the unit of measurement for barter trade therein. Alongside, the milk products are also traded in bulk and retail. Meat animals and horses are also exported to other provinces. Domestic poultry is nearly 1 million heads. Estimated population of other animals according to 2010 census is over 1.6 million as shown in Table 5.4 below.

| Serial | Livestock | 2010 Census |
|---------------|------------------|--------------------|
| (1) | Cattle | 374,327 |
| (2) | Buffalo | 9,706 |
| (3) | Goats | 897,212 |
| (4) | Sheep | 279,592 |
| (5) | Horses | 4,745 |
| (6) | Donkeys | 21,424 |
| (7) | Yak | 19,559 |

| | | |
|---|-------|-----------|
| (8) | Mule | 963 |
| (9) | Total | 1,607,528 |
| Source: Livestock Department of GB Government. | | |

There is a modest number of livestock care and cure facilities. Table 5.5 shows the details.

| Table 5.5: Livestock Facilities in GB. | | | |
|---|--|-------------|--------------------|
| Serial | Type of Facility | 2006 | 2013 |
| (1) | Veterinary hospitals | 7 | 14 |
| (2) | Dispensaries | 90 | 167 |
| (3) | Poultry farms public sector | 3 | 4 |
| (4) | Poultry farms private sector | 1 | 23 |
| (5) | Sheep farm | 1 | 1 |
| (6) | Hatchery | 1 | 1 |
| (7) | Animals treated | 126469 | Data not available |
| (8) | Animals vaccinated | 343174 | Data not available |
| (9) | Animals slaughtered in slaughter house | 65622 | Data not available |
| (10) | Animals slaughtered privately | 26944 | Data not available |
| Source: Livestock Department of GB Government. | | | |

GB has the facilities both for fish farms and fresh water fishing. Trout is the brand name of fish in GB. Virtually all water bodies in GB including waterways such as rivers, lakes, waterfalls and torrents contain trout and other species. There are many varieties of trout in GB such as the brown trout and rainbow trout. Likewise, the rivers of Deosai Plains including Shahtung, Chhota Pani, Barra Pani and Kala Pani have a great number of Himalayan trout. In addition, native species of fish are also found in GB such as schizothorax and khapuke. Breeding period of different species varies. The fisheries department of GB also holds an International Trout Fishing Tournament during the month of June every year.

The Fisheries Department deals with both the fish farms and fish in the natural reservoirs and waterways. The number of fish farms and hatcheries in GB is rising. Table 5.6 contains details.

| Table 5.6: Fish Breeding Facilities in GB. | | | |
|---|--------------------|-------------|-------------|
| Serial | Description | 2006 | 2013 |
| (1) | Trout hatchery | 8 | 10 |

| | | | |
|---|--------------------|---|----|
| (2) | Trout farm | 2 | 5 |
| (3) | Trout nursery | 1 | 22 |
| (4) | Carp breeding farm | 3 | 3 |
| Source: Fisheries Department of GB Government. | | | |

Wildlife such as markhor, ibex, blue sheep and fish has played a great role in food security of GB for centuries. However, because of overkill due to group hunting, some of the species were becoming endangered. The concept of trophy hunting was introduced in 1980s by IUCN. The details have been covered in the pages on economic security. GB is also home to sport fishing. The Fisheries Department issues licences for angling at a rate of Rs 200/- per day for Pakistanis and Rs 600/- per day for foreigners. Catches are monitored by the watchers and wardens detailed by the department. A person can catch up to six fish on a single licence per day.

Unlicensed fishing and angling is prohibited. The violators are apprehended and their fishing apparatus taken into custody. During a discussion with the author on the subject, a senior wildlife officer in Skardu told that he had some 32 fishing nets and a lot of rods confiscated from illegal fishers. However, illegal fishing both with rod and net continues for food purpose. The Fisheries Department does not have enough wardens and watchers to patrol thousands of kilometres of river waters, major torrents and lakes to check illegal acts.

The department is also running a number of fish farms in GB. It also supports the private fish farms and hatcheries. The fishing licence starts from March 10 and ends on December 31 each year. The rest is the breeding season. Fish reproduces at a fast pace.²⁷⁹ Fish is an important part of the food security in GB and is a dividend of geography and thus geo-humanism.

Whereas the soil cannot be cultivated round the year, human consumption needs persist throughout the years and increase during winter season. The animal fodder is also an important part of food requirement in the areas. The summer has to yield both for summer and winter. The people of higher elevations particularly suffer. In reality, GB is suffering from food deficiency because of the geographic constraints. The single crop zones are actually food insecure. GB does not produce the amount of food grain required for human consumption. Food security governance adds to the geographic problems. People in GB believe that the subsidy on wheat, on the one hand, solved the problem

²⁷⁹ Shakoor Ali, Watcher Fisheries Department at Sadpara Lake, Interview by author, Sadpara Lake Skardu, February 11, 2016.

of food grain deficiency but, on the other hand, it somewhat perpetuated it by putting the GB's farmers at ease. They have shifted to cash crops like potato instead of growing wheat which, due to government subsidy, they are getting on rates cheaper than it is available in other provinces of Pakistan. Another problem with the system of subsidy is that it is across-the-board and does not target the poor. The Chief Minister of GB is authorized to purchase the subsidized wheat as much as his peon can do. The answer lies in targeting the poor and deserving population. They can be registered and allowed certain quota of wheat. According to Muhammad Fazil from Maarfi Foundation, 'cash, rather than wheat, should be given to the poor people in terms of subsidy'.²⁸⁰ This would solve the problem to some extent.

It is also of note that most of the villages at higher elevations, the single crop zones, do not have fruit trees of any kind. This perpetrates the problem of food insecurity in such areas.

Wheat freight subsidy (along with salt) was sanctioned for GB by the federal government in the 1970s. It was given in view of the fact that by the time wheat reached GB, especially the remote valleys of the region, its price increased many times. Wheat transportation charges from the Punjab and other provinces to GB were unbearable. Thus, to reduce burden from the people of GB with regard to this important food item, the system of subsidy was introduced.

In 2001, the wheat quota of GB was 700,000 sacks (100 kilograms each). The budget allotment was about Rs 1.8 billion. By 2010, GB's wheat allocation became 1,500,000 sacks. But the amount of subsidy remained the same. Thus, in stages, the wheat share increased but the budgetary allocation for the purpose remained constant. Actually the amount has been decreasing as the wheat support price in Pakistan increased annually. Liabilities of Gilgit-Baltistan's food department continued to pile up with Pakistan Agricultural Storage and Services Corporation Limited (PASSCO) and reached Rs 32 billion by June 30, 2015. The federal government has now taken responsibility to pay its amount and the GB government its from now on.

There are a lot of hurdles faced by the GB's Food Department and the people of GB at large. The subsidy system and the wheat provision chain in GB suffer from many snags and pitfalls due to two factors: geography and food security governance. Earlier, wheat used to be dumped by December for the following year. Since July

²⁸⁰ Muhammad Fazil, Manager Maarfi Foundation, Interview by author, Skardu, September 20, 2015.

2015, it has shifted to a monthly system which is not helpful. The financial mechanism changed from July 1, 2015 onward. The Federal Government's Finance Division pays Rs 6.045 billion to the Food Department of GB against the support price (further payable to PASSCO) and transportation charges (further payable to the contractors). The GB's Food Department musters another about Rs 1.65 billion by selling the wheat to the people for Rs11.00 per kilogramme. Thus, the annual wheat budget of GB totals Rs 7.7 billion.²⁸¹

GB is being released 100,000 sacks on a monthly basis. The Federal Finance Division releases it to the Ministry of National Food Security and Research (MNFSR). The MNFSR issues the directive to the PASSCO. The PASSCO has eight major zones. It authorizes various zonal heads to issue a given number of wheat sacks to the GB's Food Department. Often, it is just a few thousands from one of the zones. The zonal heads further allocate one or more procurement centres (each zone has 15 to 20 procurement centres) for collection of wheat by GB's Food Department. Thus, 100,000 wheat sacks are often collected by the GB's Food Department from six to eight zones located across the province of Punjab. The GB's Food Department is responsible for the transportation of wheat. It makes transportation contracts on annual basis.

The transporters lift the wheat from various procurement centres of PASSCO in containers and unload it in the base godown of GB's Food Department located in I-11 Sector of Islamabad, which has a storage capacity of about 150,000 sacks. Wheat is reloaded in trucks from Islamabad (the KKH, so far, cannot take the load of containers) and carried to 28 depots located across Gilgit-Baltistan (there are three categories of depots in GB by size and function: bulk, sub-bulk and sale depot). From bulk and sub-bulk depots, wheat is further transported to sale depots. At the sale depots, it is available for sale to the people of GB. They take it to their respective villages at their own expense. Thus, it is a 10-step process, which is both complex and cumbersome. Figure-24 illustrates the chain.²⁸²

²⁸¹ Muhammad Iqbal Shigri Deputy Director Food Baltistan, Interview by author, January 20, 2016.

²⁸² Illustrated by the author on information provided by Iqbal Shigri.

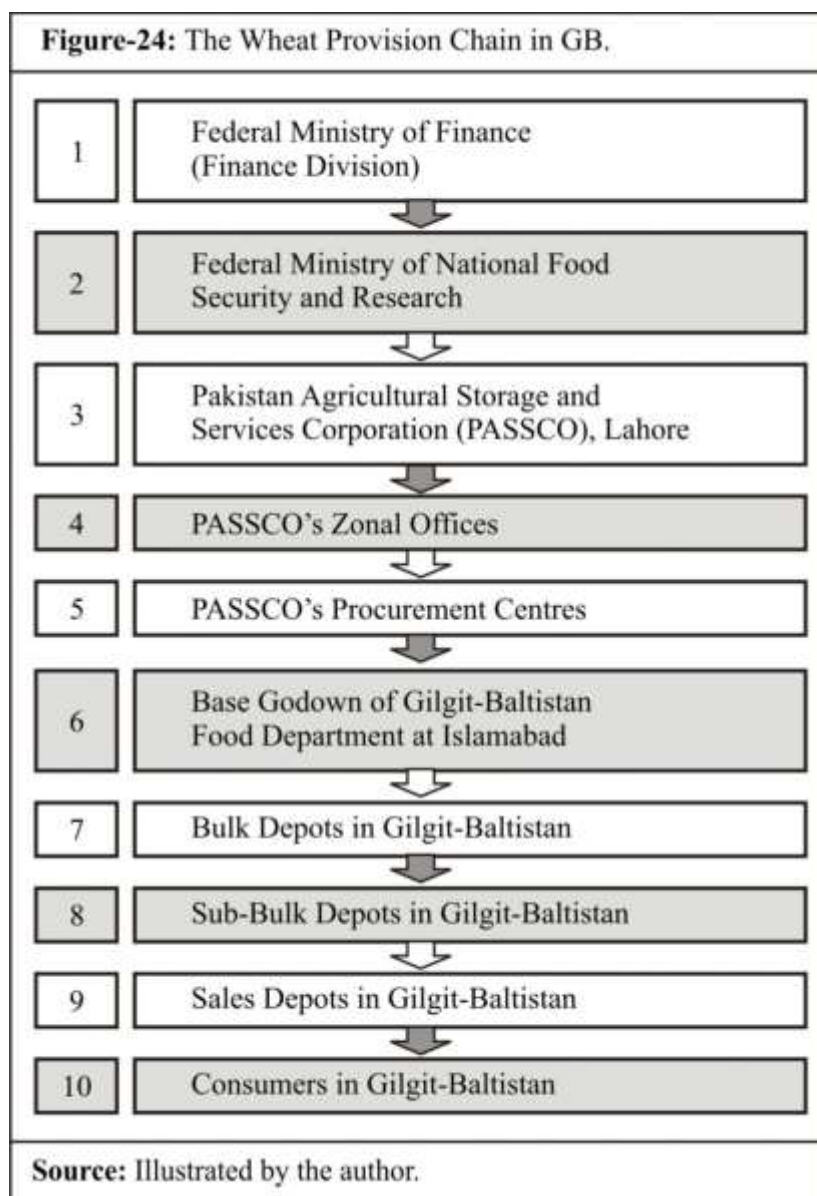
A number of hurdles *en route* are inexplicable. The problem is that the bureaucracy in the federal ministries does not comprehend the food security problems being faced by the people of GB. Often grade-17 or 18 level officials take arbitrary decisions, create hurdles and overly delay the process. On the other hand, the officials of GB's Food Department are also reported to hatch up with contractors, transporters and other individuals involved in the chain to embezzle and misappropriate *en route*.

The common people suffer due to non-availability of wheat in the sales depots. In

December 2014, the

people of Upper Braldu complained to the author about total absence of wheat from the areas depots. In December 2015, six to seven persons from each of the nine villages of Upper Braldu came to Skardu to get wheat from civil supply officer. They stayed in the hotels of Skardu for about a month, spent a lot of their routine income, and at the end, each of them got two to four sacks of wheat (100 kg each).²⁸³

Muhammad Iqbal Shigri, Deputy Director Food Baltistan opines that Gilgit-Baltistan would remain deficient of food. During an interview with the author, he



²⁸³ Jafri, 2016.

said, ‘It is not possible for GB to be self-sufficient in food due to a number of reasons. Population is increasing. There is pressure of agricultural facilities. Many agricultural fields have been converted into residential accommodation. Fruit orchards have been grown on agricultural land earlier used for crops’.²⁸⁴ Thus, alongside physical geography, food insufficiency is the function of human geography, and thus geo-humanism.

Iqbal Shigri also believes that the apparently positive role of NGOs in GB finally results into a negative outcome. He said, ‘Some NGOs have made people of the area accustomed to spoon-feeding. They paid them heavily. The locals today do not work hard unlike their forefathers. Even the animal fodder is being brought to GB from Punjab, purchased by the locals and fed to the milk pets such as cows etc.’ It points to a decline in agriculture that leads to food insecurity impacting greatly on the human security profile of the region.

Food deficiency has also been caused by a change in culture. Before 1970s, people used to eat fruits and vegetables. Apricot used to be the main food grain in GB. Apricot used to be cooked and consumed in routine meals. In addition, other local agricultural products were also being used. The wheat requirement was nearly being met from local yield except for some quantity that was brought in from the Punjab. It has changed since the start of wheat subsidy in 1970s. Now, on the one hand, wheat has become the main item of daily meal, while on the other hand, it is not being produced in GB in sufficient quantity. Now, in addition to wheat, people consume sugar, salt, tea and processed food in greater quantity than before. This creates a demand-production gap, which in case of wheat and salt is met by provision of these commodities on subsidy. Certainly, it cannot remain like this for an indefinite period because it is subject to government policy. Likewise, with more connectivity and exchange of cultures, GB has also undergone a cultural transformation.

It is also of note that due to small landholdings and the effects of remoteness, people in most of the valleys are using old methods of farming. Use of scientific methods is the need of the day so as to boost agricultural yield. More so, the research and development methods and processes used in the provinces on lower elevations are not valid in GB due to the difference of climate and soil.

²⁸⁴ Iqbal Shigri, 2016.

Whereas climate change phenomenon is influencing the agriculture in GB in many ways, there is a temporary benefit too: shorter the winter season, longer the cultivation season. To this end, Haji Fida Muhammad Nashad, Speaker GBLA, a seasoned politician and intellectual from Baltistan region, said, 'Due to shortened winter season caused by the climate change and global warming, single crop zones in GB can be converted into double, and double into triple crop zones.'²⁸⁵ Certainly, this cannot happen right away. However, short period crops can be sown and the crisis of climate change turned into opportunity based on the seasonal changes in various valleys. According to Muhammad Sikandar Ali, the climate is no colder than in the past but the culture of agriculture has not changed in GB. Centuries old methods of agriculture are being used. No scientific development of agriculture procedures has been tested or introduced in GB. Glaciers are melting fast, which may have a long term effect on agriculture and thus food security.²⁸⁶

Geography acts as impediment in a number of ways. The terrain is rugged. The distances are long. Agricultural holdings are fragmented. The farmlands are small and scattered. The area lacks use of technology. The private sector participation is inadequate. On the other hand, geography of GB has a lot of characteristics and can be the best expedient for food security in GB. The land in GB suits best the agricultural activities including cultivation of crops and fruits and activities such as livestock and fisheries. The land is highly fertile. Survival rate of trees is almost 100 percent, if planted in accordance with the needs of the time and soil.

Water is plentiful. There is no such thing in GB as waterless agriculture or rainwater agriculture. River, spring and torrent water is available in all areas for agricultural purposes. GB is rather a source of water for entire Pakistan. The climate is ideal for fruits and vegetables of mountainous areas. The soil has low level of pest population and crop disease. Marketable surpluses of a variety of fruits, both fresh and dry, are available in the region in addition to the substances like potato. Profitable varieties of fruits can be grown in large quantity with huge exportable surplus. The region can best produce organic food.

Thousands of acres of land in GB is lying barren and vacant. If made cultivable, it can be used for farming or social forestry. There is a great potential for

²⁸⁵ Nashad, 2016.

²⁸⁶ Sikandar Ali, 2015.

vertical and horizontal expansion of the agricultural sector in the region. There is huge potential for investment in the agricultural sector, agro-industrial sector and fruit value chain. This can, in turn, resolve the issue of food insecurity to a great extent besides adding to the economic security of the region. However, it needs public sector support and private sector initiatives.

In earlier times, people in rural areas of GB used to nourish artificial glaciers. The artificial glaciers used to be of two types – male and female. The male glaciers used to be bluish in colour while the female glaciers were whitish in complexion. It was a complete science. It took about 30 to 35 years for a glacier to mature. It does not exist anymore because of change in human priorities.

A lot of land can be brought under cultivation. Sufficient quantity of water is available. Water uplift schemes from various rivers can be helpful. Off season vegetables and crops, grown in GB, can be made available in the Pakistani market. This can contribute to improving the economic security conditions in GB. However, it needs both the government and the locals to contribute toward it. If they do, geography can offer a lot of dividends. But people, as Haji Fida Muhammad Nashad says, prefer to get government jobs, which bring monthly income to them. However, at the end of the day, it is the responsibility of the state to give a direction to the people so as to improve their human security conditions.

Remoteness of GB also contributes to food insecurity. In first place, most of the GB region is either a single-crop zone or a double-crop zone. This denotes that despite availability of cultivable land and sufficient water, climate and weather do not allow to grow as many crops as is possible in the plains of Punjab, the lower elevation valleys of Khyber-Pakhtunkhwa and Azad Jammu and Kashmir, and the deserts of Sindh. This means less food grain, thus less food security. The remote valleys and villages of GB on higher elevations face even more problems. Another issue with the valleys on higher elevations is that *firstly* there are either no or little fruit trees like in Upper Braldu in Shigar district and Chipurson valley in Hunza district, and *secondly* the fruit does not fully ripen due to a comparatively short summer season.

All these, coupled with the difficulty of transportation of food items from other provinces, create a general state of food insecurity or at least food deficiency. The state of food insecurity was even more telling before construction of KKH and consequent linkage with the other provinces of Pakistan. The situation improved thereafter and the problems of remoteness alleviated to some extent. The grant of

subsidy by the government on wheat and salt in 1970s provided added relief. The magnitude of problem can be gauged from the information revealed by Haji Muhammad Hussain (aged 72 years in 2016) from Hushe village: ‘When I was young, Hushe village had 35 households. We were given a quota of 9 maunds of salt, which used to be issued from Skardu. Nine young men from Hushe (including Haji Hussain) used to go to Skardu and carry a maund of salt each on back to Skardu. It was 8 to 9 days long journey.’²⁸⁷ Hushe is 153 km from Skardu if we go by road today. The salt party of Hushe used to make short cuts *en route*, yet it was no less than 125 kilometres of continuous journey with 40 kilogramme of salt on everyone’s back. Such was the state of human insecurity, now improved yet needing considerable improvement.

In sum, food security in GB is a function of geography. It is pure geo-humanism. However, food security governance and technology can work to improve the food conditions in the region using geography as a conduit and expedient.

Health Security

Geography has a great role to play in health security of GB. Heights in GB vary from 5,000 feet to 28,251 feet.²⁸⁸ There are a number of high altitude related diseases, which have no parallel on lower elevations. Generally speaking, there are no all weather human settlements above the height of 3,500 metres. Three categories of people go beyond this height: (1) Natives for the purpose of hunting, cattle breeding and crossing high mountain passes to travel to other valleys and regions; (2) Mountaineers and trekkers both local and foreigners; and (3) Military persons for employment on the defensive positions over Karakoram and Himalayas.

GB poses high altitude health challenges especially on the elevations above 14,000 feet. High altitude ailments include: high altitude pulmonary oedema (HAPE), high altitude cerebral oedema (HACE), pulmonary cardiac arrest, acute mountain sickness (AMS), hypoxia, hypothermia, cold injury, frostbite and chilblain. Other diseases such as pneumonia, low or high blood pressure, hypertension, peptic ulcer and psychological issues also occur at high altitude and take longer to heal compared

²⁸⁷ Haji Hussain, 2016. Maund has been a unit of measurement in the British India, which measured varying in different areas. In most of the Indian (now Pakistani too) provinces, it used to equate 40 kilogrammes. The unit of maund still continues in rural areas of Pakistan.

²⁸⁸ The height of K-2, the second highest peak in the world located in Shigar district of GB, is 28,251 feet (8,611 metres).

with the non-mountainous areas due to the factors such as weather and time taken on evacuation of patients from the point of occurrence to a medical facility.

Cold injury means extreme effect of cold on any part of human body. Technically, it also includes frostbite, hypothermia and chilblain. It may occur due to strong wind, blizzards or decline in temperature due to any reason. Excessive exposure of a person or one's body limbs to cold is the prime cause of cold injury. Frostbite is a state in which a part of body, often the fingers of hands or feet, are damaged due to extreme cold or frostiness. It is a form of cold injuries and has three degrees – first, second and third degree – according to the severity or depth of damage. Mountaineers, trekkers and soldiers often suffer from frostbite due to excessive exposure of hands or feet to cold. The soldiers from other provinces and non-native people often suffer from snow-related and high-altitude diseases and syndromes. Notwithstanding the frequency of incidence, natives too face such issues. For instance, a village retailer, named Fida Hussain, from Kharmang district suffered from third degree Frostbite in January 2016 while he was moving in snow-covered area and was treated in a local medical facility.

Figure-25 shows the condition of his feet after frostbite. Likewise, there have been cases of cerebral and pulmonary oedema. However, frequency of such diseases in the natives is comparably less than the

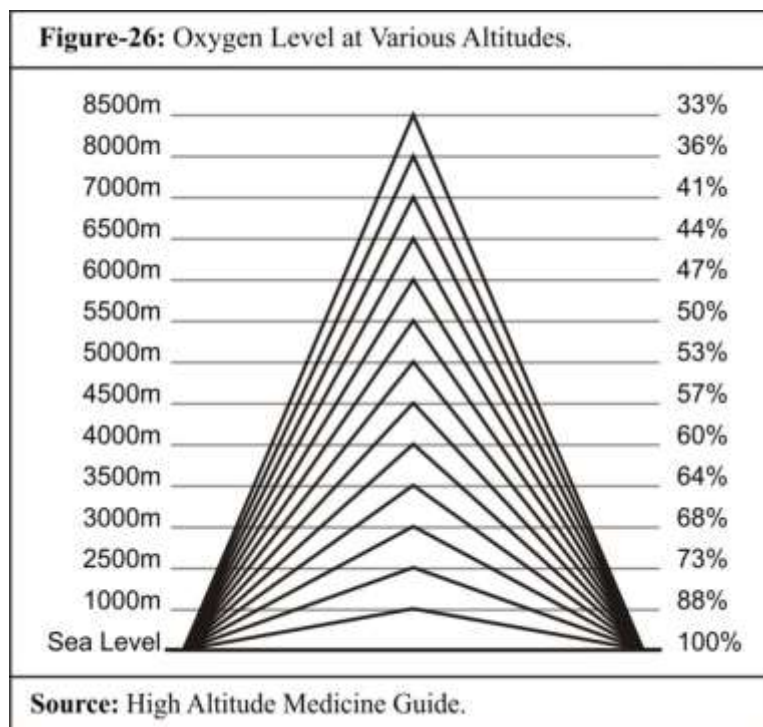


non-natives. This is partly because of genetic makeup of the people of high-altitude dwellings and partly because of perpetual acclimatization and adaptation to the environment.

Hypothermia is another form of cold injury. In this case, the human body loses temperature quickly. The body's core temperature drops below 35.0 °C (95.0 °F). The entire body is struck by frigidity in case of hypothermia as against frostbite which is a local ailment. The ability to bear cold in natives is comparably more than the non-

locals due to comparably more haemoglobin. The added haemoglobin also helps combat lack of oxygen, pulmonary issues and cerebral problems.

Hypoxia means oxygen deficit affecting the body tissues of an individual. It is also called hypoxiation. It may affect the entire human body but at times has local effect on one or more limbs. Actually, the amount of oxygen continues to reduce with increase in height. On the 14 peaks in the world above 8,000m elevation, the quantum of oxygen is reduced to 33 percent of the mean sea level. Most of the mountaineers need to use supplemental oxygen on higher elevations. Hypoxia is the root cause of HAPE, HACE and AMS. Details of oxygen levels at various altitudes are given in Figure-26.²⁸⁹



Acute mountain sickness (AMS) is also called altitude sickness and hypobaropathy. It is pathological effect of high altitude on humans triggered by extreme exposure to cold and oxygen deficiency. It occurs above the height of 2,500m. Lack of appetite, nausea, weaknesses, vomiting, cough and fever etc are the earlier symptoms of AMS. It may turn into HAPE or HACE. HAPE is fluid accumulation in the lungs whereas in case of HACE, the human brain swells and ceases to function. After rapid ascent (within 24 hours) to elevations beyond 8,000 ft, up to 20% of persons develop AMS. All persons experience AMS beyond 17,500 feet. However, intensity varies. It is hard to determine as to who are suffering from AMS and who are not because virtually everyone bears the symptoms. Proper acclimatization is the best answer to the issue. The mountaineers as well as the soldiers follow the acclimatization process. Negligence in this regard results into high altitude diseases.

²⁸⁹ Illustrated by the author. Adopted from "Oxygen Available at Altitude as Compared to Sea Level," *High Altitude Medicine Guide*, quoted in *the Altitude Mouthpiece*, <http://www.altitudemouthpiece.com/> (accessed on March 10, 2016).

Various environmental hazards too lead to casualties and health issues. They include avalanches, snow-slides, blizzards and land-slides. Deaths over the high altitude also occur due to crevasses. Hundreds of mountaineers have lost their lives on their way to or from the five eight-thousanders (peaks with height more than 8,000 metres) of the world located in the GB region of Pakistan or nearly 100 seven-thousanders. Many more fell sick or suffered injuries or limbs amputation due to frostbite. The sick or injured ones are evacuated, some of them by helicopters. In 2015, some ten mountaineers hailing from the US, UK, Nepal, China and Japan were evacuated by Pakistan Army aviation.

Physical makeup of human beings, animals and plants in GB is linked with the geographic structure and climate. Genetically, the people born and bred on high altitude have larger lungs and more haemoglobin. It points to greater oxygen carrying capacity in their blood. The high altitude animals also have similar genetic capacity. However, there are a number of facets and factors that affect health security in GB. The human health is affected by oxygen deficit, extreme cold and lack of health facilities. On this, Wazir Jaffar, a health and physical education lecturer, said, 'Due to extreme cold and other geo-climatic issues, life expectancy in GB is comparatively less'.²⁹⁰

Haji Muhammad Hussain from Hushe village said, 'Due to its height above sea level and the length of winter season, Hushe village is different from other villages in the district and the district headquarters itself. Health insecurity is one of the main issues facing the people. It is aggravated by lack of transport and communication means. Women in the family way face particular problems. There have been instances wherein the women died on way to Khaplu, the district headquarters.'²⁹¹ This is just an example. In point of fact, all villages of GB located on elevations about 3,000 meters face similar difficulties may they be in Ghanche, Skardu, Hunza or Ghizer districts. The geography affects evacuation of sick and injured both in terms of time and cost. For instance, Askole is some 113 kilometres from Skardu. This much distance takes just about a couple of thousand rupees for hiring an ambulance and just about an hour and a half to travel from Point A to B, for example from Rawalpindi to Jhelum. But the old vintage Toyota jeeps take nothing

²⁹⁰ Jaffar, 2015.

²⁹¹ Haji Hussain, 2016.

less than Rs 7,000/- to shift a patient from Askole to Skardu in about 6 to 7 hours over a bumpy and windy dirt track. The poor patients can ill afford to pay so much. So much of travelling also deteriorates the condition of the patient. It takes as much time and money for a patient to travel from Zood Khun village in Chipurson valley to the town of Sost. Evidently, it is a display of geo-humanism.

It is metaphorically said that there are only two weathers in GB – cold and extreme cold, or winter and extreme winter. It is not wholly wrong. Winter season prolongs for at least six months from November to April. The remaining months are also moderate in temperature. The cold causes ailments due to inadequate heating arrangements. Fuel is insufficient. There is a lot of pressure on local forests. Cow dung is used as alternative fuel in some areas. It produces heat but has its own health hazard. The gas produced by cow dung burning also becomes part of food when cooked over dung fire and causes health issues.

GB is the water reservoir of Pakistan. There is no dearth of water for agricultural, bathing and washing purposes, and animal consumption. However, the water is not clean enough for human consumption in many parts of GB. Fresh spring water, which is generally potable, is available and used during summer especially in rural areas. However, springs are often frozen during winter. Thus, water from nullahs and torrents is consumed both by humans and animals. It is often contaminated due to animal waste and other unhealthy particles.

There are places where water becomes scarce during winter and snow is melted by heating for human consumption. This has its own health hazards as the snow is not clean and consumable. A native from Askole in Upper Braldu valley stated: 'From 2014-2016, water in Askole village was so contaminated by cow dung and horse refuse that it smelled like dung but people were compelled to consume it.' Certainly, water contamination increases pathogenic microorganisms, which is a major cause of disease. *Inter alia*, it is a major cause of intestinal worms and kidney stones. The government has failed to arrange for clean drinking water sources. In some of the villages, foreign and local NGOs have established water supply schemes.

Food deficiency also creates nutritional deficiency in people from all ages especially children. This aggravates health insecurity in some families especially in the upper reaches of the territory. The growth of children is affected and life expectancy also reduces. Malnutrition, especially protein calorie malnutrition, has an adverse effect both on mental and physical growth of children, productivity and the

number of working years of a person. A study dating back to 1985 revealed that malnutrition in infants in GB resulted in a higher rate of infant mortality. Some 19.5 percent of infants died during the first year after birth and 13 percent between one to four years. It affected their height, weight, arm circumference and mental abilities.²⁹² Iron deficiency anaemia is also found in all sections of population especially the children aged 5 to 9 and pregnant women. Goitre is another nutritional deficiency.

During focus group discussions, some natives said that deficiency of food leads to physical and mental health deficit in the children of remote valleys of GB. Hence, they are not able to compete with the children from other areas. While it is not altogether true, some of the children do face health deficit due to food deficiencies. On the whole, due to rugged geography and harsh climate, people of GB are tough and healthy, and can endure the rigours of terrain and weather better than people from lower elevations.

Another role of geography with regard to health security is the availability of a lot of medicinal herbs in all districts of GB. Astore district is particularly famous for such herbs. Deosai plains have countless species of medicinal herbs. For instance, Ishkeen is a local herb found in the form of bush. Its roots are eaten by those with fractures. It joins the broken bones. The injured birds eat its leaves etc and are healed. It has a lot of iron and calcium. In olden days, it was used frequently. With reduced frequency, it is still being used especially in the rural areas. It is a wild growth in mountains and is rather scarce. It is bitter in taste if found in the areas with insufficient water but the bitterer, the better. Likewise, *salajeet* is a medicinal produce of some stones in high altitudes. It is used for joint pains and backache etc.

The matter of concern is that this geographical potential of health security in GB is not being used appropriately. The medicinal herbs remain largely under-explored and under-utilized. Tibet, a distantly adjoining region has a herbal medicine university. There is no such institute that can work on the way to research and development (R&D) in the field of herbal medicines.

Lack of health facilities is the main issue (Table 5.7).

| Table 5.7: Health Facilities in GB (2013 data). | | |
|--|-----------------------------------|-----------------------|
| Serial | Description | Number in 2013 |
| (1) | Total hospitals | 33 |
| (2) | Combined military hospitals (CMH) | 2 (80 beds) |

²⁹² Muhammad Akmal Khan.

| | | |
|--|--------------------------------------|----------------------------------|
| (3) | Civil government hospitals | 29 (936 beds) |
| (4) | Private hospitals | 2 (50 beds) |
| (5) | Total dispensaries | 169 |
| (6) | Dental centres | 13 |
| (7) | Private clinics and dispensaries | NA |
| (8) | TB / Leprosy centres | 23 |
| (9) | FAPs | 192 |
| (10) | RHC | 2 (50 beds) |
| (11) | Basic health units (BHUs) | 17 |
| (12) | MCH centres | 90 |
| (13) | Paramedic / Nursing Institute | 1 |
| (14) | Indoor patients treated during 2012 | 40,275 |
| (15) | Outdoor patients treated during 2012 | 1,274,914 (repetitions included) |
| Source: Health Department of GB Government. | | |

Ostensibly, as shown in Table 5.7, there is satisfactory number of health facilities in GB. However, in view of the population dwelling over 72,496 square kilometres located in remote valleys, they do not suffice. Thus, geography affects the number and location of health facilities. The number of doctors and paramedics is even more serious a problem than the number of health facilities. Table 5.8 shows the gravity of the situation. Quite apart from the insufficiency of medical staff, even the authorized staff is far less than that needed. According to international standards, every settlement should have two doctors, one dentist and eight nurses or paramedics. However, GB has one doctor for 5,241 people, one dentist for 38,240 people and one paramedic for 914 people. There is an approximate deficiency of 2,249 doctors and 1,264 dentists.²⁹³

| Serial | Category | Authorized | Held |
|--|------------------------------------|------------|-------|
| (1) | Medical officers (male and female) | 228 | 154 |
| (2) | Specialist doctors | 114 | 66 |
| (3) | Dentists | 32 | 28 |
| (4) | Drug inspectors | 5 | 5 |
| (5) | Nurses | - | 31 |
| (6) | Lady health visitors (LHVs) | 132 | 111 |
| (7) | LHWs | 1,400 | 1,281 |
| (8) | Lady health supervisors | 102 | 66 |
| (9) | Paramedics | 1522 | 1370 |
| Source: Health Department of GB Government. | | | |

²⁹³ Data obtained from the Health Department, Government of Gilgit-Baltistan, February 11, 2016.

The problem is that the doctors, even those hailing from GB, are reluctant to serve in GB – more so in the rural areas. Even the doctors who graduate from medical institutions of other provinces and the federal institutions on the GB's reserved seats do not mostly come back to serve in GB. Thus, many patients are evacuated to other provinces of Pakistan for medical treatment. Some of those who do not get proper treatment die.

There are numerous military medical facilities, including one combined military hospital each at Gilgit and Skardu. Several small size military medical facilities are also located in Gilgit, Skardu, Shigar, Kharmang, Khaplu and Astore districts due to the deployment of military therein. Civilians are being treated in military hospitals. Besides, military medical facilities, free medical camps are established in remote valleys and areas affected by calamities such as floods from time to time. In addition, some NGOs also establish free medical camps in far-flung areas.

All told, GB is suffering from health insecurity due to geographic constraints and impediments which is an expression of geo-humanism. The health security response needs to be tendered keeping in view the geographical constraints.

Persons with Disabilities

Health disabilities are common in GB. Muhammad Hassan, Vice President, Karakoram Disability Forum (KDF) stated that there are about 46,000 persons with disabilities (PDs). About 5.5 percent people in Baltistan have various kinds of disabilities. These people are suffering from four categories of disabilities to include physical, hearing-speech, visual and multiple. About 1,600 persons are registered.²⁹⁴ KDF has provided some of the PDs with hearing aids, wheel chairs, walking aids such as sticks, white canes, surgical shoes, shoulder pulleys, eyesight glasses and artificial limbs. KDF also arranged for a week long business management training of 21 PDs. Of them, 16 have successfully started their businesses. Two of them were begging on the road side before training. They are successful retailers now. KDF has various financiers from society and NGOs like Agha Khan Rural Support Programme

²⁹⁴ Muhammad Hassan, Vice President, Karakoram Disability Forum, Gilgit-Baltistan (based at Skardu). The interviewee himself has disability in right leg due to polio diagnosed after three years of birth, March 31, 2016. During field work, author was told by Ahmed Ali, a member of Thalay Local Support Organization (TLSO) that there are about 250-300 disabled persons in Thalay valley with various disabilities. The author also visited and met disabled persons in Hushe village. They are 13 in total.

(AKRSP) and Civil Society Human and Institutional Development Programme (CHIP).

There are no specific health and rehabilitation facilities for disabled persons in GB. The ordinary health facilities available are also on payment. Special education centres (SEC) were established at Hunza, Gilgit and Baltistan in 2004. Whereas they are functional at Gilgit and Hunza, the SEC in Skardu is yet not completely constructed. In Gilgit and Hunza, the government also gives pick and drop service to persons with disabilities. The government has never given assistive devices to disabled persons. The disabled students and employees face particular problems reaching schools and offices on time and returning. Because of geographic hardships, it is difficult for them to the schools or offices as is taken for granted by those without disabilities. This has gravely affected the school intake of children with disabilities. On this issue, Muhammad Hassan, Vice President, KDF, said, 'In Baltistan region, only about 5 percent of the children with physical disabilities are enrolled in school. All others are out of school. All children with such disabilities as hearing, speech and blindness are out of school because there is no education institution for such special children in Baltistan.'²⁹⁵ Syed Yousaf Shah President, Karakoram Disability Forum (KDF), said, 'Persons with disabilities have no patronage from government. Even government jobs quota prescribed as 2 percent is not being given to the disabled persons. The government has no strategy for rehabilitation of disabled persons of Gilgit-Baltistan.'²⁹⁶

Muhammad Hassan also said that there is a need for inclusive education. The educational institutions and teachers should be able to teach both normal and special children so that the special children do not suffer from an inferiority complex. This way, the normal and disabled children would go to the school and come back together. The normal children would be able to help their class fellows with disabilities. This would facilitate accessibility of the disabled children to school. It would increase their interaction and thus a healthy society, which has respect for the persons with disabilities, can be founded. Muhammad Hassan maintains that disabled persons also face problem with regard to marriage because of the parents' fear of

²⁹⁵ Ibid

²⁹⁶ Syed Yousaf Shah, President, Karakoram Disability Forum (KDF), Gilgit-Baltistan (based at Skardu), Interview by author, Skardu, March 31, 2016. The interviewee himself has disability in both legs due to polio diagnosed after five years of birth.

distribution of family assets especially land. They want to keep the disabled person deprived of the family inheritance.

Syed Yousaf Shah told that some of the disabled persons are kept by their families like goats and sheep. He said, ‘We went to visit some disabled persons in Roundo. Their families were reluctant to let us meet them. We saw that some of them were kept in separate rooms like animals. Food was thrown in side their room through a hole in the room. It is not human. It is like animals.’ Syed Yousaf Shah told that there are some handicapped people who do not have personal names. He said, ‘Once we when to Ghanche district and met young man with 100 percent hearing and speech disability. We asked his name from his parent. They did not know. Later, we asked his name form the boys in the surrounding area. They said, “we call him Kareem”. Actually, his parents had not named him. They just called him *ghut* (meaning deaf and dumb in Balti language. To call him, they would say anyone: Please call *ghut*.’ People with disabilities lack access to public places. There are a number of public offices and facilities, which cannot be easily accessed by the disabled people due to the structure of the building as such. This problem is pervasive in countries like Pakistan as against the requirements of the UN Convention on the Rights of Persons with Disabilities.

A developed society with passion and compassion for persons with disabilities can produce a scientist in the form of Stephen Hawking. An underdeveloped society may often treat them like animals as is upheld by Muhammad Yousaf, a polio affected person himself. It is also of note that geography has a special effect on the life of persons with disabilities. The cold weather of GB aggravates the physical disabilities.

On the whole, geography and climate of GB aggravates health security in the region. Improvement is required in health security governance and required use of modern health sector technology to cope with the problem.

Personal Security

Personal and community security in GB has a number of manifestations. The people settled in different valleys are separated from each other and isolated. This has resulted in distinct cultural, linguistic, religious and racial divisions. These independent social structures developed and sustained without any outside interaction for centuries. This created distinct societies highly suspicious of outsiders and inherent prejudice against other valleys embedded in a long history of mutual conflicts, that with time became the part of folklore and local history.

Geographic remoteness and isolation of different valleys of GB is being done away with by improvement of communication. This has definitive effects on socio-cultural and peace environment of the region. This geography and the consequential development of the multi-cultural society have thus contributed greatly to the law and order situation in this region. Internal peace in some valleys is also now being disturbed with the improvement of the communication and inter-mixing of these people of varied cultural backgrounds that has given rise to vicious conflict on the basis of ethnicity, tribes and religion. Gilgit city that has a mix of the population of all valleys of Gilgit-Baltistan is an example of the law and order challenges that we have to confront.

Apart from this make up of the society that has a direct impact on the law and order situation, the difficult terrain also creates extremely testing situation for maintaining order by law enforcement agencies as they too have to deal with these physical barriers in movements as well as in operations against the hardened criminals and terrorists.

The key expression is the safety of life and protection of property. The difference between personal and community security is that of level, scale and magnitude. Whereas the threat to an individual's life and property leads to personal insecurity, community security denotes vulnerability of a complete community to one or more threats. Personal security as a subset of human security means security of life and property against direct violence.

The problem of law and order in Diamer division is rooted in geography, history and system of governance. Narrow valleys, proximity to Kohistan and Malakand, and tribal governance perpetuate personal insecurity. The threats facing personal security in GB also include terrorism, sectarian violence, ethnic violence and societal crimes. The flow of terror from FATA, Swat and Kohistan areas certainly affects the personal security in GB. The Nanga Parbat bases camp terror attack on June 22, 2013 is a case in point wherein some 16 terrorists attacked and killed 10 foreign mountaineers. The abduction of two officials of the Special Communication Organization (SCO) from Diamer district in 2015 is yet another instance to highlight. Actually, the Diamer district, especially the Darel and Tangir areas, are terror prone. Traditionally, the writ of the government in these areas has been weak since the British and Dogra times.

Bahadur Ali Salik, a senior journalist from Baltistan, believes that there are genetic and religious reasons for comparative peace in the areas. He said, ‘Before arrival of Islam in the area, Buddhism was the main religion in GB. Buddhism keeps away from violence. Buddhists are peaceful people. They avoid killing even a sparrow. Islam also preaches peace. So, it became a good combination of peace in the area. Hence, people of GB are peaceful and stay away from violence.’ On being asked as to why then–sectarian violence has been occurring in GB, Mr Salik was of the opinion that ‘Violence comes into the region from outside. The people of Baltistan do not have violence in their genes. The people of Chilas area do have some violent tendencies but they are different from the people of Baltistan. The Baltis are more akin to Ladakhis and Tibetans.’²⁹⁷

Sectarian violence in GB is linked with sectarian makeup of the region. Sectarian tension continues to simmer even during the periods of calm. There have been instances in recent history, for instance in 1988 and 2005, involving a number of people from both sides of the sectarian divide – Shia and Sunni. From 1988 to 2010, some 117 cases of murder on sectarian grounds were registered, 74 were challenged, 15 cancelled, 10 remained untraced and 15 are pending investigation. The tally does not include 170 cases of attempted murder.²⁹⁸ The textbook controversy from the year 2000 to 2005 and assassination of Agha Ziauddin, a Shia scholar, in Gilgit in January 2005 served to ignite sectarian tensions more widely. Its flames reached up to Baltistan, which has been quite peaceful till then. The tension continues to exist and so does the sectarian terrorism. For example, on February 28, 2012, some 16 people were debussed in Kohistan district and killed after checking their identity cards and ascertaining that they were Shia.²⁹⁹

With regard to effect of geography on sectarian makeup and resultant sectarian violence, Afzal Ali Shigri, ex Inspector General Police (IGP) Sindh, who hails from Shigar district, said:³⁰⁰

²⁹⁷ Bahadur Ali Salik, Editor, Daily Siachen, Skardu, Interview by author, Skardu February 17, 2016.

²⁹⁸ “Sectarian Conflict in Gilgit-Baltistan,” Background Paper, *Pakistan Institute of Legislative Development and Transparency* (May 2011): 17.

²⁹⁹ Uzaira Khan, “Passengers hauled off buses and gunned down: 16 killed in Kohistan sectarian attack,” *Dawn*, February 29, 2012, <http://www.dawn.com/news/699097/passengers-hauled-off-buses-and-gunned-down-16-killed-in-kohistan-sectarian-attack> (accessed May 13, 2016).

³⁰⁰ Afzal Shigri, 2015.

The physical divide effectively segregated the entire region into different sects. While Baltistan has a majority of Shias with Noor Bakhshia an offshoot of Shias, Chilas is Sunni dominated, Nagar has Shia majority, Ghizer/Hunza Ismalia and Gilgit being the capital has a mix population. Before their conversion the people of the area were predominantly Buddhists. As long as the Buddhist social/cultural norms of tolerance lasted there was no problem due to sectarian issue but with time the sectarian intolerance has surfaced in a violent form due to the outside influence that is affecting the entire Islamic world. This violence has taken a heavy toll. This has further cemented the local prejudices amongst people of different valleys giving rise to serious law and order problems.

Seen through the eyes of law enforcement agencies, geography plays a definitive part towards personal and community security. Inspector General GB Police Malik Zafar Iqbal considers the case as follows:³⁰¹

Geographical conditions play [a] vital role in formation of strategies to enforce law and order. Vast plain stretches with multiple paths to approach a certain point, easy accessibility, wider line of sight, chances of open assaults and retrieval of forces have like merits and demerits for law enforcers as well as subversive elements. Such geography dictates different issues as compared to mountainous terrains which are normally difficult in accessibility with numbered paths to a certain point, scattered population having myriad advantages to the persons knowing the terrain. It would be useful to narrate a recent example of an illegal procession in Hunza district [of Gilgit-Baltistan] where the local police did not use maximum force to block the procession which had only two options; either to confront or to retreat because there were hills on one side of the road and a deep abyss on the other. Police considered that the crowd had limited options to disperse hence only calculated force was used, which might not cause excessive damage in case of confrontation. Thus, it was geography that determined the conduct of [the] police.

Malik Zafar Iqbal believes that geography also determines the ways of patrolling, strategy to place check points, plans to arrest criminals, arrangements to handle disorder and the means employed for detention. GB, being a mountainous and valley-based area, has its own peculiarities.³⁰² A few of its advantages and disadvantages are as follows:

Advantages

- Lesser police strength can geographically block and check a large area.
- It takes time for the criminals to flee with relatively fewer routes and more chances to be seen.
- Important installations can be safely guarded due to limited outreach.
- Movements can be monitored better.
- Complex geographies are always supportive, hence successful raids.

³⁰¹ Inspector General Gilgit-Baltistan Police Malik Zafar Iqbal, Telephonic and WhatsApp Interview by author, January 15, 2016.

³⁰² Ibid.

Disadvantages

- Limited roads to move, hence more vulnerable for the movement of people under threat.
- Difficulty in access to outlaws who hide themselves in difficult areas as is the case of a terrorist group in Diامر District of GB.
- Scattered population due to generally unsuitable land, hence it is expensive and time consuming to reach remote areas.
- Line of sight is short due to hills hence patrolling has limited effect at a certain points.
- Foot trekking is a remote possibility in detection.
- Normal modern aids, vehicles and hand-held communication devices are situationally compromised.
- Retrieval as well as rescue in case of danger becomes difficult.

With improvement in the movement due to the construction of road network, there is a new trend of the shifting of the crime from one valley to another as well as ingress by the criminal elements from other parts of the country. The occurrence of crime is a fluid phenomena that, when challenged by a well-knit cohesive society, shifts to the area where the criminals can get local support. The crime therefore also shows a shifting trend in the region.

Geography not only influences the make-up of GB but also has caused and perpetuated the sectarian division in the entire region. The isolation that was responsible for its peace has now become a burden. Away from a vocal media glare and attention, the violent conflicts go unnoticed and the cycle of violence once set in motion due to external factors continues to draw blood for long periods. Local inherent prejudices obstruct and impede the early resolution of conflicts. Due to the makeup of the region and its unique security challenges, the people have suffered collectively as they cannot agree on a united charter of demands for the resolution of major political, social and developmental issues and tragically the federation has also neglected the area. According to Afzal Ali Shigri, ‘Any improvement and development that one sees is due to intervention of some international NGOs or to meet the needs of the federation.’³⁰³

³⁰³ Afzal Shigri, 2015.

Ehsan Bhutta, Home Secretary of Gilgit-Baltistan believes that the law and order situation in GB or any other place of the world should not be seen through the prism of a single factor. It is dependent on a host of factors which intermingle to improve or to worsen the situation. As far as GB is concerned, geography undoubtedly has been a major factor in the law and order situation deteriorating and it affects both the individuals and the communities.³⁰⁴ Ehsan Bhutta also believes that before the onset of the Afghan War (1979 to 1989), the whole of GB was a peaceful place though it was demographically divided on sectarian lines with Baltistan region predominantly Shia, Gilgit region with sizeable population of Sunnis living peacefully side-by-side with Shia and Diamer (Chilas), a predominantly Sunni area. With other areas of Pakistan, the Afghan War also influenced the law and order situation in GB. The Afghan war influence, in a way, is also a product of geography as GB's border adjoins Afghanistan too.

Annex E contains the data on crime and terror cases including sectarian violence, in GB from 2001 to 2015. It corroborates the notion that, on the whole, compared with other parts and provinces of Pakistan, the personal security state in GB is much better. Geography and social makeup, which is also based on geography, has certainly a role in it.

Community Security

Community is the basic and well organized social unit in Gilgit-Baltistan above the primary human security referent i.e. the individual. The community structure of GB may be studied from many angles such as ethnic, tribal, linguistic, sectarian and geographic. GB is administratively divided into three divisions to include Gilgit, Diamer and Baltistan and ten districts to include Gilgit, Ghizer, Hunza and Nagar districts in Gilgit Division, Diamer and Astore districts in Diamer division and Skardu, Shigar, Ghanche and Kharmang in Baltistan division. Each district is further divided into tehsils and subdivisions. This is the official division of the region into administrative parts on civic lines. However, the GB's society is still functioning on tribal lines. There are three types of settlements in GB: urban areas; rural settlements in the main valleys; and rural clusters located in the far-flung narrow

³⁰⁴ Ehsan Bhutta, Secretary Home Department, Government of Gilgit-Baltistan, Interview by author, Gilgit, February 12, 2016.

valleys including those located at the snouts of glaciers. Within the tehsils and subdivisions, there are numerous geographic communities managing the human security affairs along tribal lines.³⁰⁵

A geographic community consists of a cluster of villages located in proximity and generally connected throughout the year including winter. These geographic communities have many things in common. For instance, Sadpara valley, located 12 kilometres south of Skardu, consists of five villages including Chagongrong, Haiderabad, Miriaq, Dari and Milpan having about 300 households, is a geographic community. All these villages are co-located in a valley leading further south to Deosai Plains. The people have to co-exist braving the human security challenges posed by the physical and human geography. They have evolved a community system to do that. Likewise, there are 12 villages located in Chipurson valley in Upper Hunza which form a geographic community. It is 72 kilometres in length. Its elevation above sea level ranges from 3,000 metres to 4,925 metres. Its western border adjoins the Wakhan Corridor of Afghanistan. The people of the valley have been living as a community for centuries. They have their own language – Wakhi – different from Lower Hunza, where Burushaski is spoken, their own history, myths, customs, eating habits and living style.

For centuries, they have been socially and economically linked with the Wakhan Corridor of Afghanistan and the Gorno-Badakhshan region of Tajikistan rather than lower Hunza and Gilgit. They have been engaged in barter trade and are still carrying this out across the border. Similarly, Basha, Upper Braldu and Lower Braldu valleys are geographic communities in Shigar district. Lower Braldu valley (*Braldu Payeen*) has 12 villages including Tistun, Daso, Nidh, Biansa, Ghoyongo, Foljo, Bianco, Sehdar, Kunar, Ho, Ghumboro and Thoso. Upper Braldu valley (*Braldu Bala*) has 10 villages including Pakora, Hoto, Seno, Korphe, Munjong, Sorungo, Askole and Tistey. In Upper Hunza, Shimshal is a geographic community with nearly 250 households living in four small villages namely Farmanabad, Aminabad, centre Shimshal and Khizarabad. Three clans of the Kathor tribe are living in Shimshal

³⁰⁵ The term geographic community was originally defined and used in Dennis E. Poplin, *Communities*, 2nd ed., (New York: Macmillan Publishing, 1979) and subsequently in Michelle Poland and David Mare, "Defining Geographic Communities," *Motu Working Paper, Motu Economic and Public Policy Research Trust*, Wellington, New Zealand (June 2005), www.motu.org.nz (accessed June 16, 2017). It is being applied herein to the Gilgit-Baltistan's socio-geographic environment with practical manifestation.

which include Boqi Kathor, Ghazi Khathor and Bakhti Kathor. It is a completely Wakhi speaking geographic community.

Eight villages of Basho valley in Roundo tehsil of Skardu district including Matillo, Bathang, Khar, Guncho, Meito, Doros, Nazimabad and Sultanabad combine to make a geographic community. For instance, Thalay valley in Ghanche district is a well organized geographic community. Thalay valley is situated some 40 kilometres away from Khaplu, the headquarters of Ghanche district, and 110 kilometres from Skardu at an elevation of 8,800 ft above mean sea level. It is divided into two parts: Upper Thalay and Lower Thalay. The valley has a total of 17 villages. Ten of them are as follows: Chundu, Tassu, Harangus, Parangghus, Haltagari, Yarkhor, Daltir, Gagurik, Baltoro and Burdas. It has a total of 1,246 households and population above 12,000.³⁰⁶

Thalay is a potent example of geographic community. The Thalay Local Support Organization (TLSO) is a functional representative body of the valley. It has a board of directors as well as a general body and management staff. Every village has its own village organization (VO), womens' organization (WO) and youth organization (YO). TLSO is an umbrella organization of 17 village organizations (VOs) and 22 womens' organizations (WOs). It comprises elected politicians, union council members, youth and women. It works for socio-economic uplift and even as a justice body of the valleys. The main human security issues it looks after are education, health, conflict resolution and communication. Women members are consulted on women related issues. There is a Peace Committee of TLSO, which resolves local conflicts between individuals and villages or communities. Ahmed Ali, a member of TLSO notes that 'if one of the factions does not attend the Peace Committee, s/he is free to go to the police station or the court. Many a time police station returned the cases to the Peace Committee.'³⁰⁷ This shows the effectiveness of the local peace mechanism.

There are some exceptions to it. For instance, Hushe valley (total 1,347 households) in Ghanche district has a total of seven villages including Machlu (490 households), Talis (330 households), Balaygond (55 households), Marzigond (72

³⁰⁶ Data obtained from Thalay Local Support Organization (TLSO), Thalay valley, Ghanche district, October 18, 2015.

³⁰⁷ Ahmed Ali, Member Thalay Local Support Organization (TSLO), Ghanche district, Interview by author, Daltir village, Thalay valley, Ghanche district, January 25, 2016.

households), Khanay (80 households), Kanday (160 households) and Hushe (160 households).³⁰⁸ The valley has a Machlu-based union council, which deals with various human security issues of the valley as an official body of the area. However, each village has its own informal bodies. For instance, Hushe village has two such bodies: The Hushe Welfare and Development Organization (HWDO) and the Village Conservation Committee (VCC). The villages of Hushe valley have separate community organizations. It is partly because of the distance. The valley is 44 km long from Machlu to Hushe. On the other hand, nine villages of Upper Braldu in Shigar district are located within a distance of 10 km and thus it is easy for a single organization to manage this geographical community.

The case of communities differs slightly from area to area within GB. In the case of Nagar district, there are numerous communities dwelling in some 20 valleys are follows: Chalt, Sikandarabad, Jafarabad, Nilt, Thol, Masot, Gulmet, Yal, Pissan, Minapin, Miachar, Dadimal, Phakker, Hakuchar, Shayar, Askurdas, Sumayar, Nagar Khas, Hoper and Hispar valleys.

Since ancient times, some of the villages are organized into three parts: Yar Khor, Shakill Khor and Gab Khor. Yar Khor is the set of villages on highest elevation i.e. the upper part of the village. Shakill Khor is the group of households located in the middle of the village. Gab Khor is the cluster of houses located at the foothills, the base of mountain or the lowest elevation within the same village. These are Balti language words and this village pattern is peculiar to Baltistan division. However, other divisions of GB also have such arrangements for ease of community dealings.

Each village has a numberdar. A numberdar is the head of the village and is usually the eldest member of the community, though not always. The eldest son of the numberdar often remains his assistant throughout the year, and normally he becomes numberdar after his death. In some cases, the brother of a deceased numberdar becomes numberdar. In some of geographic communities, e.g. in Upper Braldu, the numberdar alternatively (annually) details one of the three parts of the village for fulfilment of such responsibilities of the village as animal rearing, construction of walls or fences to regulate the movement of cattle. Those found lacking in discharge of collective responsibilities are fined, often in kind (mostly wheat or barley flour),

³⁰⁸ Data obtained from Haji Muhammad Hussain, ex Chairman Union Council Machlu during Focus Group Discussion-2 held at Hushe village on February 21, 2016.

not cash. The fined flour is kept together and used for collective welfare e.g. during collective work in case of natural calamities etc. Though not exactly applicable in all sub-regions and valleys of GB, the community processes and collective responsibility system exists in one form or the other. In some villages or groups of villages, the community organization is elected by the people, and re-elected periodically.

In GB, however, a single community inhabits some of the villages. For instance, in Hushe village of Ghanche district, there are about 200 households. All of them are blood relatives i.e. from the same tribe. During a discussion in Hushe village on October 16, 2015, an elderly person Haji Hussain said that all of them were the offspring of four grandfathers and were maintaining the status of 'the same family'. It is different in case of some villages. For example, Korphe village in Shigar district has 41 households from six different tribes including Mindupong, Chhoshkenpong, Shamshupong, Mala and Hajipong (two branches: Alupong and Almadpong). All tribes are agriculturists. All 41 households have their own land. The village has a collective pasture overlooking the built-up area. Intermarriages between various tribes are common. However, Mon is somewhat ignored tribe in this regard. People from other tribes marry with them only under a degree of compulsion.

Structural violence is embedded in the economic, social and political (ESP) structures of a state or society. The weak individuals and communities in the structure remain at the receiving end, and are subjected to structural violence. The social structure of GB is different from the Punjab and Sindh. Notwithstanding the economic disparities, GB somewhat has a system of classlessness. Only about 4 to 5 percent people from GB are not landlords. The remaining 95-96 percent people possess land, whether less or more. Besides, even the landless 4-5 percent people are associated with agriculture in various forms such as animal husbandry or fish hatcheries etc. The point to note is that the communal difference seen in the Punjab and Sindh on the basis of land ownership or landlessness, by and large, does not exist in GB. In the provinces of Punjab and Sindh, various socio-economic communities are dwelling in the same village.

There are some exceptions. The Raja families in Baltistan, Mirs in Hunza and Mehtars in Yasin and adjoining region of Chitral still claim to be royal families. They have better landholdings and thus agro-economic potential. Wazirs are also maintaining their identity as such in many areas. Dom, Mon and Kameens inhabit in various pockets of GB, along with the adjoining regions including Chitral, Ladakh,

Swat and Kohistan etc. By profession, they are musicians and blacksmiths and also do some other menial jobs. During the rule of local Rajas, they used to be the musicians of their courts and palaces. In most of the areas, they are no longer working as musicians. Many of them own some land to cultivate and a house to live in; but they are still considered to be rather low caste.

There is a flipside of this egalitarian notion. There are no menials or skilled workers such as barbers, cobblers and potters in a number of areas. People have to help themselves or each other for such services. Even in 2016, only one barber shop in Skardu was being run by a native Balti. All other barber shops belonged to the barbers from the Punjab. Most of the cobblers were from Khyber-Pakhtunkhwa or Southern Punjab. However, the natives from GB have started learning and performing these jobs gradually.

The security of geographic communities also lies in management of resources, delivery of rights, distribution of responsibilities and security against hazards from physical geography as well as threats from human geography, and conservation of biodiversity around the human habitats in the valleys.

Environmental Security

GB is home to numerous environmental threats. All these are product of geography. The key ones include earthquakes, flash floods, avalanches, snow slides, soil erosion and landslides, and glacial lake outburst floods (GLOF). The phenomenon of climate change is now beginning to tell. GB receives less snow now compared with the past years. Glaciers are shrinking. It certainly affects everything from mountaineering to the agriculture and weather patterns. Glaciers are becoming dirty and their ecology is being disturbed due to military deployment and mountain tourism. Organizations such as K2CNR put in some effort in the past to clean the glaciers but no worthwhile results were attained.

Dr Ghulam Rasul, Director General Pakistan Meteorological Department (PMD), maintains that climate change has caused a variation in the rainfall pattern in GB. He believes that '[the] monsoon has reached Skardu and other parts of Baltistan. This is affecting the human security landscape of the region'.³⁰⁹ Actually, the

³⁰⁹ Dr Ghulam Rasul, Director General Pakistan Meteorological Department (PMD), telephonic interview by the author, November 14, 2015.

monsoon has essentially been a Himalayan phenomenon. Because of the same reasons, the Himalayas are known as the wet mountains. *Inter alia*, the Himalayan region has a lot of vegetation and foliage below the tree line. On the other hand, the Karakoram region is known as the dry mountains because of negligible precipitation and excessive snowfall. But the pattern is changing and is contributing to environmental insecurity in the region. Climate change is due to many reasons: first, it is a global phenomenon and certainly affects the GB region too; second, reinforced cement concrete (RCC) structures are increasing and replacing the stone masonry and woodwork; and third, smoke and heat emitted by vehicles and other machines especially in larger cities of GB.

Dr Shafqat Hussain believes that ‘natural hazards are the outcome of physical geography. However, they become natural disasters due to weak institutions and governance’.³¹⁰ Dr Shafqat is right. An earthquake of a certain magnitude on the Richter scale may devastate an affected region in an underdeveloped country but may cause only limited damage in a developed country due to better governance and sound use of technology. The state is the primary responder to a human security challenge.

In social sciences, human beings are agents and have a definitive relationship with both physical and human structures. Geography evolves with human activity. With the passage of time, human beings have turned into a geological force themselves, which has intervened in the climate pattern and worked to change it. Climate change has been triggered and is primarily being driven by human beings. Climate change is a global security issue, which intensifies human insecurity. Industrial nations are mainly responsible for climate change driven by global warming. According to Dr Shafqat Hussain, ‘Pakistan is number 3 in terms of most vulnerable countries because of climate change’.²²³¹¹ In Pakistan, it manifests itself as river floods, flash floods, glacial lake outburst floods (GLOF), droughts, shifting seasons and a more extreme weather pattern. Glaciers are shrinking. Weather patterns are changing. So, climate and geography are no longer purely natural phenomena. With the changes in climate and geography on the planet, the geo-climatic concepts and theories are also changing. Climate security is the security of humanity: human

³¹⁰ Dr Shafqat Hussain, author on GB affairs, assistant professor at Trinity College, Hartford, Connecticut, USA, and Chairman Baltistan Wildlife Conservation and Development Organization (BWCDO), Interview by author, Skardu, January 11, 2016.

³¹¹ Dr Shafqat Hussain, Interview by author.

security par excellence. Thus, geography has to be seen and studied through the prism of security, in particular human security. The impact of geography on human security today is more than ever before. Security and vulnerability are two sides of the same coin.

Wind, water, ice and snow are the primary sources that trigger erosion. All are in abundance in GB. Wind is found in the form of sandstorms in the valleys during summer and blizzards over the glaciers in winter. Snow accumulates during flurries and snowfall and shifts during blizzards. Water is the source of soil erosion both on medium and lower reaches. Snow slides and landslides cause erosion to a damaging degree. Human habitation in GB can be found between 3,500 feet and 12,000 feet, an area threatened on all elevations.

Here are two such instances. GB was hit by a massive flood in 2010 along with other parts and provinces of Pakistan. KKH was blocked for 49 days. GB faced serious deficiencies of food items. It remained cut off from the remaining part of the country. The army had to be requested for C-130 sorties to drop food in GB. Tourists, travellers, government servants and patients were trapped.

From March 25 to April 5, 2016, there was an extreme weather spell all over GB as the lower and medium reaches observed rainfall and the upper reaches underwent snowfall and blizzards. The entire region endured landslides along the roads and tracks, and snow slides and avalanches over the glaciers. Between Khunjab and Kohistan, there were 175 landslides, which blocked the Karakoram Highway (KKH) along its entire length. Likewise, there were over a dozen heavy slides along the Gilgit-Skardu Road. All resources of the GB Government including district administrations and GB Disaster Management Authority (GBDMA) as well as the Pakistan Army and the Frontier Works Organization (FWO) units in the region were mobilized. It took over one week to open the roads temporarily for light vehicles. All areas of GB witnessed a shortage of petroleum products, cement and other construction material, food grain and other eatables. The federal government released wheat on an emergency basis which was transported by C-130 sorties of Pakistan Air Force to Gilgit and Skardu. GB witnessed price hikes in the commodities that were available in the region.³¹²

³¹² The author personally observed all these happenings.

Here is yet another instance. On 10 April 2016 the entire Hindukush-Karakoram-Himalaya region including Afghanistan, Pakistan and India witnessed an earthquake measuring 7.2 on Richter scale. This triggered more landslides and snow slides in GB that blocked the KKH and many other important roads in GB. It also aggravated the already worsened state of food supplies and petroleum products in the region.

Temperature in the region is rising due to global and local warming. This has shifted the snowline upward, which has caused migration of biodiversity. The glaciers on the lower elevations are melting fast. It has also prompted the GLOF phenomenon. GLOF occurs when the moraine barriers surrounding a glacial lake can no longer sustain the pressure of lake water and ruptures. It is not Pakistan-exclusive or GB-specific. It is happening in other parts of the world too e.g. in Bhutan, Canada, Alaska, Iceland, Nepal and China (Tibet).

In the Hindukush-Karakoram-Himalayas (HKH) region of Pakistan, there are ten main river basins including Swat, Chitral, Gilgit, Hunza, Shigar, Shyok, Indus, Shingo, Astore and Jhelum with 3,044 glacial lakes (2013 data). Figure-27 carries the image of one of the glacial lakes visited by the author during field work.

Figure-27: A Glacial Lake on the Mashabrum Glacier in Ghanche district.



Source: Photo by the author, October 17, 2015.

A summary of the 3,044 glacial lakes is given as Table 5.9.

| Basin | Number | | Area (sq km) | | |
|---------|--------|------|--------------|------|---------|
| | Total | % | Total | % | Largest |
| Swat | 214 | 7.0 | 12.5 | 9.3 | 0.74 |
| Chitral | 116 | 3.8 | 5.8 | 4.3 | 1.61 |
| Gilgit | 660 | 21.7 | 37.8 | 28.1 | 2.71 |

| | | | | | |
|--------|------|-------|-------|-------|------|
| Hunza | 216 | 7.1 | 9.2 | 6.8 | 5.78 |
| Shigar | 110 | 3.6 | 2.3 | 1.7 | 0.21 |
| Shyok | 270 | 8.9 | 6.0 | 4.4 | 0.29 |
| Indus | 815 | 26.8 | 32.4 | 24.0 | 2.56 |
| Shingo | 247 | 8.1 | 11.8 | 8.7 | 1.40 |
| Astore | 196 | 6.4 | 5.8 | 4.3 | 0.49 |
| Jhelum | 200 | 6.6 | 11.2 | 8.3 | 0.98 |
| Total | 3044 | 100.0 | 134.8 | 100.0 | |

Source: Pakistan Meteorological Department.

There are a number of human security effects of GLOFs. People living on snouts of the glaciers or lower elevations of the rivers or torrents emanating from the glaciers housing endangered glacial lakes are physically imperilled. The current of the water dropping from the lakes due to GLOFs is so fast that the affected population often has no time to shift to safe places. Their cattle, houses, their material and lives remain at stake. During 2016, three outburst floods were witnessed by the author in Wazirpur (Shigar district), Nar Ghorro (Shigar district) and Sadpara (Skardu district) which caused a lot of material damage. Climate change and global warming are feared to spark off GLOF at more places in GB. All this is a product of geography and a manifestation of geo-humanism.

GB is also a home to earthquakes. It is also a home to collision of continental plates. In the opinion of geologists, is the meeting ground of ‘continents in collision’ as the Indo-Pak sub-continental mass emerges to integrate into Eurasian continent of the north-west, leaving behind two main ‘faults’ along the area.³¹³ Hence, the region has a built-in danger of earthquakes. A number of times during recent years, GB has been affected by earthquake centred around the area.

Certainly, all kinds of environmental insecurities are linked with geography. However, the response lies in the sphere of governance and the application of modern technology. The communities and region where buildings are constructed after considering the environmental threats are able to minimize damage from calamities and disasters. GB is far behind the desired level.

Womens’ Security

Women are the backbone of the agricultural economy of GB. They share the maximum load of the domestic work and agricultural activities especially in the rural areas. They maintain the house, clean it, cook and serve food to the male members at

³¹³ Zain, 2010.

home, feed their children, rear their goats and cattle, feed them in the house and clean their refuse. Women are also responsible for gathering fuel wood during summer season for the upcoming winter. During summer, they also collect and stock grass as fodder for their animals during winter. For wood and grass collection, they travel many kilometres over the folds of Pamir, Hindukush, Karakoram, Himalayas. A native from Hushe valley once remarked, ‘The backbones of our women degenerate by 45 years of age as they have been carrying 30 to 40 kilograms of load since their teenage years.’³¹⁴

For intellectual debate as well as human security reasons, women can be considered as a separate community in GB. According to M. H. Jafri, a native from Upper Braldu valley, ‘Women in GB are machines, not humans if considered in terms of quantity and continuity of work’.³¹⁵ He further said, ‘Women must work, work and work. Nearly 90 percent of domestic and agricultural work, especially in rural areas, is done by women.’ With regard to the percentage of domestic and agricultural work done by women, a question was included in the survey for this research. The question was: In your opinion, what is the percentage of domestic and agricultural work women in rural area of Gilgit-Baltistan do? 700 respondents responded the question. The quantitative mean is: 67.7 percent. This denotes that 67.7 percent of domestic and agricultural work in GB is carried out by womenfolk. This denotes that the men in GB, who certainly do other works such as government or private jobs, trade and business, perform only 33.3 percent of the domestic and agriculture work. Most of the men in rural areas are found at leisure especially during winter. According to M. H. Jafri, ‘To remain idle is a symbol of manhood and masculinity for the illiterate village dwellers’. It is the custom among the village males in many valleys not to work at home or in agricultural fields at all. The women must do everything. Thus, in such settlements, men subsist on women’s earning. M. H. Jafri also said, ‘An outspoken woman in Korphe village in Shigar district said: Throughout the day, the work presses us, and at night our husbands press us’.

Because of excessive work, women in GB face a lot of health issues and physical ailments. They do not get the desired nutrition in their food. Therefore, the

³¹⁴ Muhammad Taqi, mountaineer, Interview by author, Hushe valley, October 17, 2015.

³¹⁵ Jafri, 2016.

newly borne babies are also weak at birth and are borne with some health issues and deficiencies. The women cannot feed their children regularly and desirably.

Women also face a lot of gynaecology related issues. Only about 43.7 percent women get skilled treatment during child birth as against 52.1 percent in Pakistan on the whole.³¹⁶ Some of the women belonging to villages do not have access to gynaecologists or hospital-trained midwives. They are dealt with by the local elderly women. Therefore, some of the cases are mishandled, which increase the child mortality rate.

Women-beating was common in GB region earlier. According to natives, some men used to beat their wives in open, for example in the fields or the compound of house. Sometimes, even the children of the entire village used to go to watch this 'event'. Now, women-beating has reduced considerably due to three reasons: Economic contribution of women in the rural economy; rising literacy rate and thus awareness both amongst men and women; and consent marriages. Women do not expect and accept beating. They raise their voice against it, albeit within the boundary of the house so far. They threaten to go back to their parents' house. Certainly, it is not the case with the entire region. In certain areas, it still happens to some extent.

With regard to the type of marriages, Ahmed Ali, a member of TLSO, said, 'About 25 percent marriages are totally arranged by the parents (the to-be spouses might not have seen each other), some 15 percent are love marriages and 60 percent are consent marriages (both to-be spouses and their parents consent to the marriage).'³¹⁷ M. H. Jafri from Braldu valley views that 'now-a-days, about 40 percent marriages are held on the basis of personal likes, mostly of males'.³¹⁸ Earlier, consent of the girls was not sought. Many of them used to see the face of the husband after marriage. Now, girls do make choices. They have attained the ability to say 'yes' or 'no' in this regard. They are no more deaf and dumb. The reason is consciousness of parents and cultural transformation. However, there are hardly any cases of pre-matrimonial love in GB.

The issue of suicides by young women in GB merits to be mentioned. During a focus group discussion, it was revealed by the law enforcement community that

³¹⁶ Data obtained from Health Department of GB Government.

³¹⁷ Ahmed Ali, Member Thalay Local Support Organization (TSLO).

³¹⁸ Jafri, 2016.

Ghizer district has highest rate of female suicide. Primarily, the educated females are forced to marry less educated or uneducated males from their own communities resulting in incompatibility issues. Secondly, many of the murders of females are reported as suicide. In the case of murders, 50 to 60 percent of families do not allow post-mortem thus actual cause of death remains unknown and is declared by the relatives of the victim as suicide.³¹⁹

The Interplay of State Security and Human Security

Due to the nature of India-Pakistan and India-China conflicts and territorial linkage of GB within these conflicts, human security in GB is affected by the state security paradigm in effect. The forces of India and China are deployed facing each other in Ladakh region. Likewise, the forces of Pakistan and India are deployed along the Line of Control (LOC) and Line of Actual Contact (LAC) in GB. The latter is known as Actual Ground Position Line (AGPL) in Indian policy and military circles. Military deployment manifests the geo-strategic paradigm which points to its direct linkage with geography. On the other hand, military deployment has both positive and negative effects on human security in the region. Syed Mehdi Shah, Chief Minister of GB from 2009 to 2014, during an interview with the author, said, ‘After the Indian Army’s incursion in the Siachen glacier area, Pakistan Army’s strength in Gilgit-Baltistan increased. Due to this, Gilgit-Baltistan came into limelight, the significance of the region increased and the pace of development accelerated.’³²⁰ This viewpoint is held by various scholars, politicians, journalists and commentators in GB. They believe that if it was not for military deployment in GB, the area would have remained underdeveloped. According to a senior journalist from GB, ‘If the Army had not been deployed in GB, no facility would have reached the region’.³²¹ This points to the positive effects of the state security paradigm on the human security system in GB region.

Contrarily, there are negative effects of military operations. To this end, Muhammad Ibrahim Sanai, Minister for Information and Education in Gilgit-Baltistan claims that, ‘Military deployment has impact on glaciers, climate and human security.

³¹⁹ The Third Focus Group Discussion held at Skardu on March 21, 2016. Secretary Home and senior police officers from GB participated in it.

³²⁰ Shah, 2016.

³²¹ Muhammad Hussain Azad, President Press Club Skardu and correspondent Dunya TV in Baltistan, Interview by author at Skardu, January 27, 2016.

The Gayari incident of April 7, 2012, in which 140 military persons embraced shahadat, is also a manifestation of human insecurity linked with military deployment. The waste of Indian Army deployed in Ladakh and over Siachen is contaminating the rivers that flow into Gilgit-Baltistan. A lot of corpses and garbage flow into the rivers of Pakistan from Ladakh region of Indian-Occupied Kashmir (IOK).³²² It is a significant human security threat to the GB region and Pakistan at large.

The Line of Control between the Pakistani and Indian forces has nearly been the traditional boundary between Baltistan and Ladakh regions in the past too and had existed through the thick and thin of history. It is more or less the same today with some modifications to include Kafir Pahar captured by the Indian Army between Kargil and Batalik in addition to eight more villages. Whereas the villages in Shyok valley are still inhabited, the villages of Indus and Shingo valleys are deserted now.³²³ All these belonged to the Baltistan region both geographically and administratively but under Indian occupation, they are now part of Ladakh region.

Eight villages of Baltistan are under Indian occupation since 1971 and are now being administered by India as part of Ladakh Region of Indian-Occupied Kashmir (IOK). These include: Thang, Tyakshi, Chulanka and Turtok in Shyok and Chorbat La area; Mujbar, Farol and Hundormo in Indus valley and Karkit in Shingo valley area near the town of Kargil. According to Musa Ali, a journalist in Skardu originally belonging to Chulunka, these villages belonged to Baltistan. He said, 'There were two boundary stones, called *theore* in Balti language, placed between Chulunka and Bughadan marking the boundary between Baltistan and Ladakh before 1971.'³²⁴ This denotes that these villages originally belonged to Baltistan but are now being occupied and administered by India as part of Ladakh.

A number of villages on the Pakistani side of Line of Control in Baltistan division and Astore district have been destroyed or damaged in military duels prior to 2003. The Indian artillery indiscriminately targeted the villages and their inhabitants. This has been happening even in Azad Jammu and Kashmir (AJ&K).

Another example is of destroyed-vacated villages. Two such villages exist in the Shingo valley of Kharmang district. Brolmo and Gangni villages located less than a

³²² Sanai, 2015.

³²³ The writer has seen these villages either on map or on ground or both.

³²⁴ Musa Ali, journalist at Skardu originally belonging to Chulunka, Interview by author, Skardu, April 27, 2016.

kilometre away from the Line of Control were destroyed as a result of Indian firing in 1996. There were a total of 102 households in Brolmo and 32 in Gangni. A small water channel, which was the lifeline of Brolmo village for plants, irrigation, animal usage and human consumption, was blocked by Indian Army. So, the village became uninhabited and uninhabitable. The dwellers vacated both villages and moved to a camp of internally displaced people in Skardu. Whereas the people from Gangni village were settled back in the village in 2014 with a lot of support from Pakistan Army and local civil administration, Brolmo village remains uninhabited and uninhabitable.³²⁵ Figure-28 and Figure-29 carry the images of the villages.



Besides these, a number of villages had been destroyed, partially damaged, vacated or relocated due to Indian fire. There has been a difference in the pattern of fire by Pakistani and Indian forces. The Pakistani forces could not target the population on the Indian side for it was mostly Muslim. The Indian forces could and did target the villages on the Pakistani side because the target population is Muslim and the Indian forces are mainly Hindu. Religion has played its role in the pattern of fire and targeting since 1947.

Some of the villages in Gultari valley in Astore district have been receiving fire from the Indian side. In Shingo valley of Kharmang district, Gangni village with 32 households and Brolmo village with 70 households were completely destroyed by

³²⁵ The author visited the destroyed Brolmo village and re-inhabited Gangni village a number of times from 2014-2016, met the dwellers of Gangni inside the village and some people from Brolmo village at Skardu. Also discussed the issue with Commissioner Baltistan Division Malik Muhammad Afsar Khan (2014-2015), Deputy Commissioner Skardu Abid Ali (2014-2015) and Deputy Commissioner Skardu Musa Raza (2015-2016) in a number of meetings on the issue.

Indian artillery shelling in 1996. Both villages were vacated and the inhabitants shifted to temporary camps in Skardu. Gangni village has re-inhabited since 2014 with the help of the Pakistan Army. They resumed their lives in the village with tents provides by the Army, NGOs and district administration.

However, not even a single household has returned to Brolmo village. Actually, it is not the destruction caused by Indian artillery shelling. The water channel, which was lifeline of the village for drinking, bathing and irrigation purposes, has been blocked by Indian Army. Due to this, the crops and fruit trees of the village have dried up. Thus, it is not possible for any displaced person to be back and live a normal life. The people of Gangni village are also living in difficult conditions and trying hard to cope with the difficulties to dwell under the direct observation of Indian posts along the Line of Control in this area.

Badal village in Shingo valley, which has about 150 households, was half destroyed by Indian artillery shelling during the Kargil War in 1999. The village mosque was also damaged. The village is still managing to subsist under the observation of the Indian Army even though there is a ceasefire between the two countries since 2003. Figure-30 carries an image of the village.

Ombolong, another small village in Shingo valley, was also struck often by Indian artillery before 2003. Some of the houses were destroyed while the others were damaged. Ganokh, Dansar, Khaibat, Wachra, Cheche Thang, Marol, Mashung, Hamzigund, Sinkhermo and

Figure-30: Half of Badal village (including the village mosque) in Shingo valley of Kharmang district, destroyed by Indian army artillery in 1999.



Source: Photo by the author, January 21, 2016.

Gidiasko are ten such villages in the Indus valley of Kharmang district in GB which have been often hit by the Indian army's artillery during the decades of 1980s through 1990s, particularly in 1999. During the border escalation between Pakistan and India from 2001 to 2003, these villages were struck with even more lethal fire. Some of the

houses were destroyed while many others were damaged. Some villagers have lost lives due to the Indian army's fire. In some cases, cattle, goats and sheep also died due to fire. In one such episode, a yak in Badal village was killed due to machine gun fire from Indian army in 2002.

Khaibat village located close to the Line of Control in Indus valley had 11 households in 1999, when it was subjected to fire by Indian army. Nine of the 11 households shifted to other areas including Skardu. In 2016, there were only 2 households living in the village still with the concern that they could be struck by Indian army yet again. Most of the plants in the village, including fruit trees, were also destroyed due to fire in 1999. It will take time for their replacements to grow. In Shyok valley of Ghanche district in GB, villages such as Siksa, Siari, Partuk and Ferano were often hit by the Indian army's artillery. There was some loss of houses and animals. Some of the villagers shifted to other areas including Khaplu and Skardu. According to Deputy Commissioner of Ghanche district, 'Due to Indian shelling, Ferano village in Shyok valley of Ghanche district was vacated and relocated in Chorbat valley. People were shifted back to the village after ceasefire agreement between India and Pakistan in 2003. The Pakistan Army has also constructed shell bunkers in the village for the safety of the villages against Indian fire.'³²⁶

Military operations and fire exchange along the Line of Control led to internal displacement and migration of many people from the affected areas and separated the people of Ladakh from the people of Baltistan. The Balti community is dwelling in Ladakh region, especially in Kargil, Batalik, Chullichang and Kaksar, in large numbers. Chulunka, Turtok, Tyakshi and Thang are Balti villages under Indian occupation. Likewise, some 846 families belonging to the areas on the Indian side of the Line of Control are living in Skardu, the divisional headquarters of Baltistan. Most of them were settled in Hoto, Hussainabad and Sarfaranga areas of Skardu. Details are given in Table 5.10.³²⁷ This denotes that blood relatives are living divided on either side of the Line of Control. Divided families exist on both sides of the Line of Control. Such families on both sides want open trade and travel across the Line of Control. There is a popular demand for opening of route between Baltistan and Ladakh to ease up travelling by the affected families. According to Muhammad

³²⁶ Tariq Hussain, Deputy Commissioner District Ghanche (2015-2016), Interview by author, January 20, 2016, Khaplu.

³²⁷ Data obtained from Deputy Commissioner Skardu on January 22, 2016.

Ibrahim Sanai, the Minister for Information and Education in GB, ‘India wants to open the Kargil route i.e. Indus and Shingo River route. It favours India strategically. On the other hand, Pakistan wants to open the Shyok valley route i.e. Ferano-Thank-Chulunka route. We think that any of the two or both may be opened.’³²⁸

| Table 5.10: Internally displaced households from 1948 to 1996 due to situation along the Line of Control (Ceasefire Line till 1974). | | | |
|---|-----------------------|--------------------------|-----------------------------|
| Serial | Migrated from | Year of Migration | Number of Households |
| 1. | Kargil | 1948 | 218 |
| 2. | Zanskar | 1948 | 21 |
| 3. | Dras | 1948 | 29 |
| 4. | Sri Nagar | 1948 | 26 |
| 5. | Bughadan | 1948 | 3 |
| 6. | Other areas of Ladakh | 1948 | 32 |
| 7. | Muzbar | 1971 | 29 |
| 8. | Karkit | 1971 | 20 |
| 9. | Hundurmo | 1971 | 21 |
| 10. | Farol | 1971 | 12 |
| 11. | Kargil | 1971 | 2 |
| 12. | Chulunka | 1971 | 83 |
| 13. | Tyakshi | 1971 | 37 |
| 14. | Turtok | 1971 | 47 |
| 15. | Thang | 1971 | 15 |
| 16. | Thanot | 1989 | 59 |
| 17. | Babachan | 1989 | 64 |
| 18. | Shakma & Das | 1989 | 26 |
| 19. | Gangani | 1996 | 32 |
| 20. | Brolmo | 1996 | 70 |
| Total | | | 846 |
| Source: Data obtained from Deputy Commissioner Skardu on 22 January 2016. | | | |

Geography is playing its role in human insecurities caused by the state security paradigm in a number of ways. The war along the Line of Control being fought since 1947 certainly has a geographic context. The rugged terrain and harsh climate add to the problems of the people of the area as well as the soldiers deployed along the Line of Control. Thousands of soldiers from both sides died along the Line of Control between GB and Ladakh region from 1948 to 1984. Thousands more have died since

³²⁸ Sanai, 2015.

the Siachen conflict started on April 13, 1984. According to an Indian media source, some 879 Indian soldiers had died from April 1984 to February 2016.³²⁹

The case of Pakistan Army is no different. There have been many fatalities. On the whole, 97 percent of casualties on both sides have been due to climate and terrain. Only 3 percent of casualties have been due to combat action.³³⁰ In addition, thousands of soldiers have, hitherto, been wounded and suffered from various high altitude diseases. Indian Army is suffering from the ‘Siachen Syndrome’ – a combination of acute mountain sickness (AMS) and psychological fatigue after a short period of duty on the glacier. Approximately 60% of the Indian soldiers endure the Siachen Syndrome.³³¹ In point of fact, all, including Pakistan Army soldiers, suffer from such disorders. Various names have been used for this ailment. At any rate, the death and injuries endured by the military force is also a function of geo-humanism.

According to the natives of GB, the state security paradigm and deployment of military force has had positive effect on human security in the areas. In the course of research, many people especially those from Ghanche, Shigar, Skardu, Astore and Gilgit districts, where military forces are present, considered that due to the presence of the army, the areas was being developed. During informal discussions, many natives said that after the Indian incursion in Siachen glacier in 1984 and resultant increase in force levels of the Pakistan Army, the region saw increase in speed of development. Many roads and bridges were built by or due to presence of the Army. Besides, the Army is helping the locals a great deal in human security spheres. Over a hundred schools are being supported by Army units in the area in terms of material and financial resources. The establishment of free medical camps in remotest valleys, which are otherwise deprived of health facilities, is a standard routine for the Army. They also help people during natural calamities such as floods, avalanches, landslides and earthquakes. The Army also plays its role in internal security to guard against all sort of violence in addition to overseeing the conduct of elections and census.

³²⁹ “Siachen: 879 soldier deaths and counting,” *The Indian Express*, February 11, 2016, <http://indianexpress.com/article/india/india-news-india/siachen-avalanche-hanumanthappa/> (accessed March 8, 2016).

³³⁰ Avnita Chadha Behera, ed., *International Relations in South Asia: Search for an Alternative Paradigm*, (New Delhi, Sage Publication, 2008), 227.

³³¹ Raspal S. Khosa, “The Siachen Glacier Dispute: Imbroglia on the Roof of the World,” *Contemporary South Asia*, Vol. 8, No. 2 (1999): 195.

To this end, Afzal Ali Shigri, former IGP Sindh, said, ‘People in Baltistan and Astore districts look towards Army for human security issues, more than the civil administration. The natives and army have friendly relations’.³³² In some other parts of Pakistan e.g. Balochistan, Sindh and Federally-Administered Tribal Areas (FATA), there has been resistance against establishment of military cantonments in the past. The outlook of the people of GB, in this regard, is different. People welcome the establishment of cantonments due to the reason that it results in better human development and socio-economic progress. In a number of valleys of GB, from 2014 to 2016, people from various age groups asked the author to do something for the establishment of a military cantonment or outpost in their valley or village. On being asked as to why, their response was improved human security conditions in the area, without using the term as such.

According to Afzal Ali Shigri, people demand the establishment of military installations and cantonments because they know that it will be helpful on socio-economic plane. He also said, ‘People know that the Army is the first responder in case of natural calamities including earthquakes and floods etc.’³³³ Afzal Ali Shigri added, ‘I do not know if Army persons ever committed any excesses in the area’, or if they did so, whether they failed to dispense justice afterwards.³³⁴ This suits the natives. An army with a functional internal system and helping attitude towards the residents of GB suits them. To this end, Taqi Akhonzada, a politician and journalist from Skardu, said, ‘State security has a positive effect on human security in GB. Wherever Army reached, it brought along socio-economic development including communication infrastructure, and health and education facilities. About 40 percent of Baltistan’s economy is dependent on military presence. Army has a significant contribution towards functioning of various markets such as Gamba, Skardu, Goma, Rattu and Astore etc due to employment of military units in the area.’³³⁵

³³² Afzal Shigri, 2015.

³³³ Ibid.

³³⁴ Ibid.

³³⁵ Muhammad Taqi Akhonzada, Ex Chairman Municipal Committee Skardu and Social Activist, Interview by author, Skardu, April 11, 2016. Mr Taqi holds master degree in defence and strategic studies from Quaid-i-Azam University Islamabad, has been Chairman Municipal Committee Skardu from 1999 to 2000. He is also a social activist.

Energy Security

A significant portion of all parts and provinces of Pakistan depends on biomass for energy purposes. Biomass meets about 86 percent of the total domestic energy requirements. Some 90 percent of the rural and 50 percent of urban population depend on wood and other biomass fuels.³³⁶ It is the primary source of energy in GB especially in rural areas. Biomass is available in the form of wood from natural forest, shrubs, wood from farm forest, agricultural residues and livestock. Most of people use stone, mud and wood for the construction of local buildings, including houses.³³⁷ Public forests in mountain areas of Pakistan are 76 percent of the total forest area in Pakistan and provide most of the fuel wood required for domestic and industrial purposes.³³⁸

A part of energy needs in GB is also met by kerosene oil and natural gas in cylinders for heating, lighting and cooking purposes. However, biomass remains the main source. With a faster pace of deforestation and increasing population, it is gradually becoming harder to meet the local fuel wood requirements, the timber needs and animal fodder. It takes decades and centuries to grow a forest; is a continuing process. But, it takes a few days to remove it. For instance, juniper and other pear trees take hundreds of years to mature but a few days to cut and blaze.

Deforestation has many other environmental effects. It causes soil erosion, landslides and floods. It also disturbs the wildlife's habitats and ecosystem of the region. Ironically, there are several NGOs working for the conservation of wildlife but none for the preservation of forests as such, except for AKRSP that worked to raise awareness in social forestry and installed hydels for power generation so that pressures from the woodlands for fuel purposes may reduce. It has worked well. Neoliberal approaches are being used for control of forests, wildlife and local economies. Earlier, people in GB were averse to conservation. Now, with more awareness, people in a number of areas contribute in conservation efforts.

³³⁶ "Situation Analysis of Household Energy Use and Indoor Air Pollution in Pakistan," *Department of Child and Adolescent Health and Development*, World Health Organization (2005): iv.

³³⁷ Ghulam Mohammad, "Potential of Biomass and its challenges in Sadpara Valley, Skardu Baltistan Pakistan," *Term Paper (ISS) submitted to the University of Oslo, Norway* (September 2006).

³³⁸ "Multiple Functions from Mountain Forests I. Mountain Forests: Sources of Wood," in *Forests in Sustainable Mountain Development: A State of Knowledge Report for 2000*, ed. Martin F. Price, Nathalie Butt (New York: CABI Publishing, 2000), 252.

Water is the only source of power generation in GB, unlike other parts and provinces of Pakistan where many other sources including oil, gas, coal, wind and solar energy are being used for the purpose. Besides, GB has abundant hydropower potential, which can generate sufficient power to contribute towards energy security in Pakistan. However, it has not yet been utilized. From the current level of power generation in GB, even the local needs are not being met.

There are a total of 170,000 electricity consumers in Gilgit-Baltistan. Total power demand, as of 2016, is 255 MW during winter and 100 MW during summer. 24 hours load demand remains the same due to cooking, heating, lighting and electronics requirement. Installed capacity in GB is 133.3 MW. This includes 116 MW of GBPWD (water and power) and 17.3 MW of WAPDA (Sadpara Dam in Skardu). The generation capacity is less than the installed capacity. Some 85 MW is generated during summer and 52 MW during winter. There are a total of 122 hydel power projects of varying sizes – 0.1 MW to 18 MW. The largest hydropower project is located at Naltar in Gilgit district with a generation capacity of 18 MW. Sadpara Dam (WAPDA project) in Skardu comes next with generation capacity of 17.3 MW.

Ironically, GB has an officially declared hydropower potential of 40,000 MW as identified by Hydropower Organization of WAPDA in collaboration with GTZ Germany during the period 1992-1996.³³⁹ Potential of the identified sites is 27,745.27 MW. But it cannot meet even the meagre demand of 255 MW during winter and 156 MW during summer. Skardu is the second largest town of GB after Gilgit. It has a total of 27,000 consumers with 40 MW demand during winter and 14 MW during summer. The installed capacity of Sadpara Dam is 17.3 MW but its average generation is 5 MW during summer and winter. The maximum generation hitherto has been 11 MW. Skardu city also gets power from Kachura Hydro Power (3 MW), Sermik (1.5 MW), Mehdiabad (1 MW) and Shumail (1 MW). On the whole, power theft in GB is more than 50 percent. Ghizer district is lowest on power theft, Skardu is next and Ghanche is the third. Diamer district is the worst in this case.³⁴⁰

The rates of electricity in GB are comparably less than other parts and provinces of Pakistan: Rs 2 up to first 150 units, Rs 3 up to first 300 units; and Rs 4

³³⁹ This pertains to the Indus River and its main tributaries. The sub-tributaries have added power generation potential estimated at 1,200 MW.

³⁴⁰ Data obtained from Hamid Hussain, Executive Engineer, GB Public Works Department (Water and Power), Skardu on May 4, 2016.

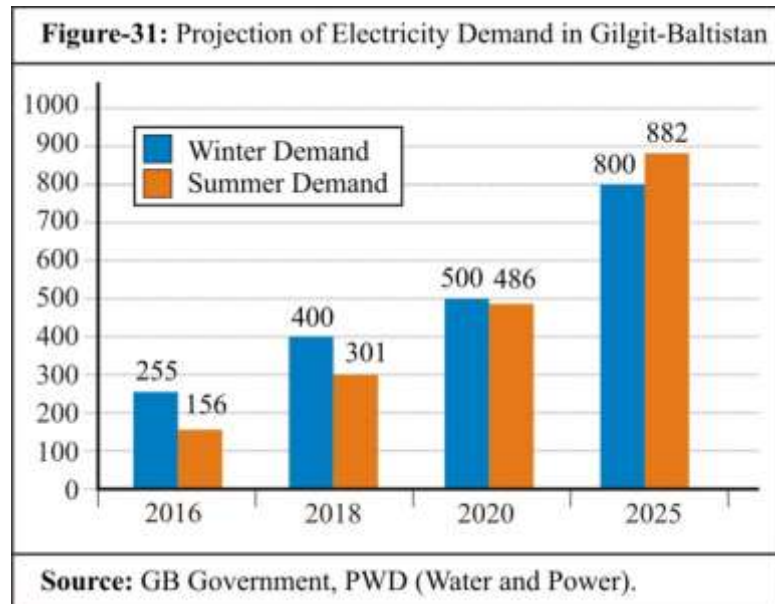
up to first 400 units. According to Hamid Hussain, Executive Engineer, GB Public Works Department (Water and Power), 'If bills are received correctly, Rs 1 billion revenue can be generated. But contrarily, only Rs 450 million could be collected in 2014/2015 i.e. less than 50 percent of total bills. The target for the year 2015-2016 is Rs 600 million.'³⁴¹

Certainly, the power demand in the region would continue to rise with increase in population and economic activities. Official statistics are shown in Figure-31.

Series of large size hydro projects have also been planned

on the Indus River in GB to benefit from its 40,000 MW declared hydro potential. A few to name are: Yulbo Skardu Dam (3,000 MW), Tungus Skardu Dam (2,000 MW), Katzara Dam (15,000), Shagarthang Dam (26 MW), Basho Dam (28 MW) Bunji Dam (7,100 MW), Diamer-Bhasha Dam (4,500 MW) and Dassu Dam. However, some of them, for instance the Skardu Dam, are reported to have been shelved. Work on Shagarthang (Skardu) HPP 26 MW and Thak (Chilas) HPP 4 MW could not be started due to non-availability of finances. Another point to note is that GB is still not connected with the national grid due to its remoteness.

Energy security is a vital aspect of economic opportunity structure of any region, including GB. It is also an inescapable part of human security at large. Geographically speaking, GB has enough potential for power generation. The shortfall is only in the realm of governance and use of technology when considered in the light of geo-humanism.



³⁴¹ Hamid Hussain, Executive Engineer, GB Public Works Department (Water and Power), Skardu, Interview by author, May 4, 2016.

Chapter-6

**PUBLIC OPINION DATA ANALYSIS
(BASED ON RESEARCH SURVEY RESULTS)**

General

An opinion survey, using a combination of cluster and random sampling techniques was conducted, which was helpful in supplementing the interviews and vice versa besides producing empirical and quantitative data. Ten clusters based on the 10 districts of GB had been formed in order to seek opinion from all corners of GB. These included Astore, Diamer, Ghanche, Ghizer, Gilgit, Hunza, Kharmang, Nagar, Shigar and Skardu. However, within each cluster, random survey techniques have been adopted. Thus, it has been a combination of random and non-random techniques that added validity to the survey.

GB has a total population of 1.249 million (2016 estimates). According to Survey Monkey, a sample size of 385 is required for a confidence level of 95 percent and margin of error of 5 percent. A sample size of 16,421 is required for a confidence level of 99 percent and confidence interval of 1 percent.³⁴² Likewise, according to the Creative Research System, a sample size of 384 is required for a confidence level of 95 percent and confidence interval of 5 percent.³⁴³ The author chose to aim for a confidence level of 95 percent and margin of error of 5 percent for which at least 385 valid forms were required. A total of 1,000 forms were sent each for Survey-1 and Survey-2 (supplementary survey). The response was quite encouraging. Table 6.1 shows details of the sampling data for Survey-1.

³⁴² “Sample Size Calculator,” SurveyMonkey, <https://www.surveymonkey.com/mp/sample-size-calculator/> (accessed December 5, 2015).

³⁴³ Ibid.

| Statistics – Research Survey Form 1 | | Percentage |
|---|-------|--|
| Total forms sent | 1,000 | 100% |
| Received back filled | 761 | 76.1% of total forms sent |
| Invalid (due to wrong entries or half filled) | 61 | 8.01% of the total filled forms received |
| Valid | 700 | 92.10 percent of the total filled forms received |

Survey Clusters and Number of Forms

Response from all clusters was encouraging as shown in Table 6.2. It may be seen that on the whole, 10% (+/-) forms were returned filled from all clusters.

| Clusters (District) | Number of Valid Forms | Percentage by District |
|----------------------------|------------------------------|-------------------------------|
| Astore | 78 | 11.1 % |
| Diamer | 68 | 9.7 % |
| Ghanche | 81 | 11.6 % |
| Ghizer | 71 | 10.1 % |
| Gilgit | 69 | 9.9 % |
| Hunza | 60 | 8.6 % |
| Kharmang | 64 | 9.1 % |
| Nagar | 65 | 9.3 % |
| Shigar | 64 | 9.1 % |
| Skardu | 80 | 11.4 % |
| Total | 700 | 100 % |

Gender Frequency of Sample

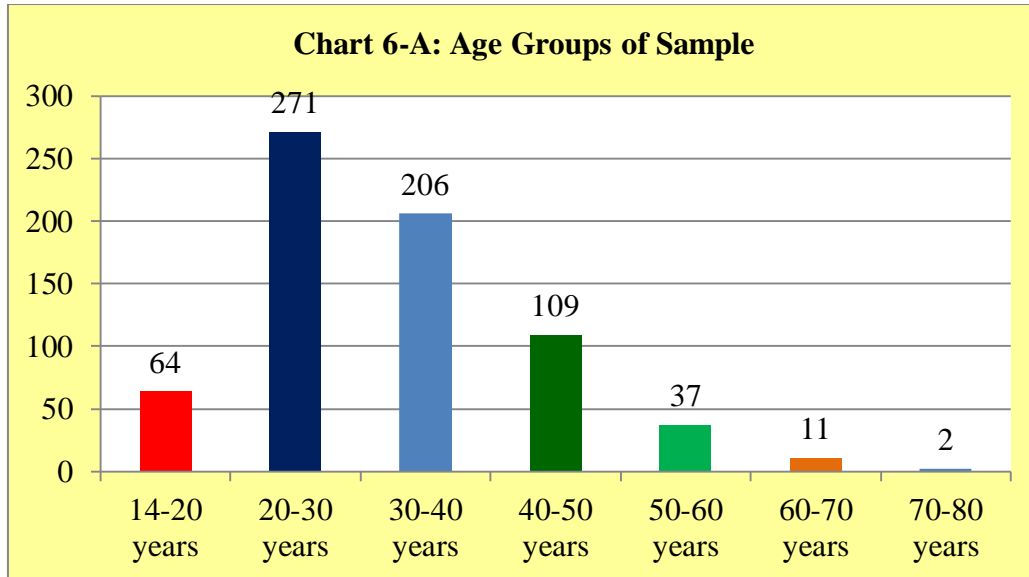
Equal numbers of forms i.e. 500 each for male and female respondents were initiated. However, due to the conservative nature of the society surveyed, the response of female respondent was less than the male segment as shown in Table 6.3.

| Segment | Frequency | Percentage |
|---------|-----------|------------|
| Female | 292 | 41.7% |
| Male | 408 | 58.3% |
| Total | 700 | 100% |

Age Groups of Sample

The sample has seven different age groups as shown in Table 6.4 and Chart 6-A. The youngest respondent is 14 years old whereas the eldest is 73 year old.

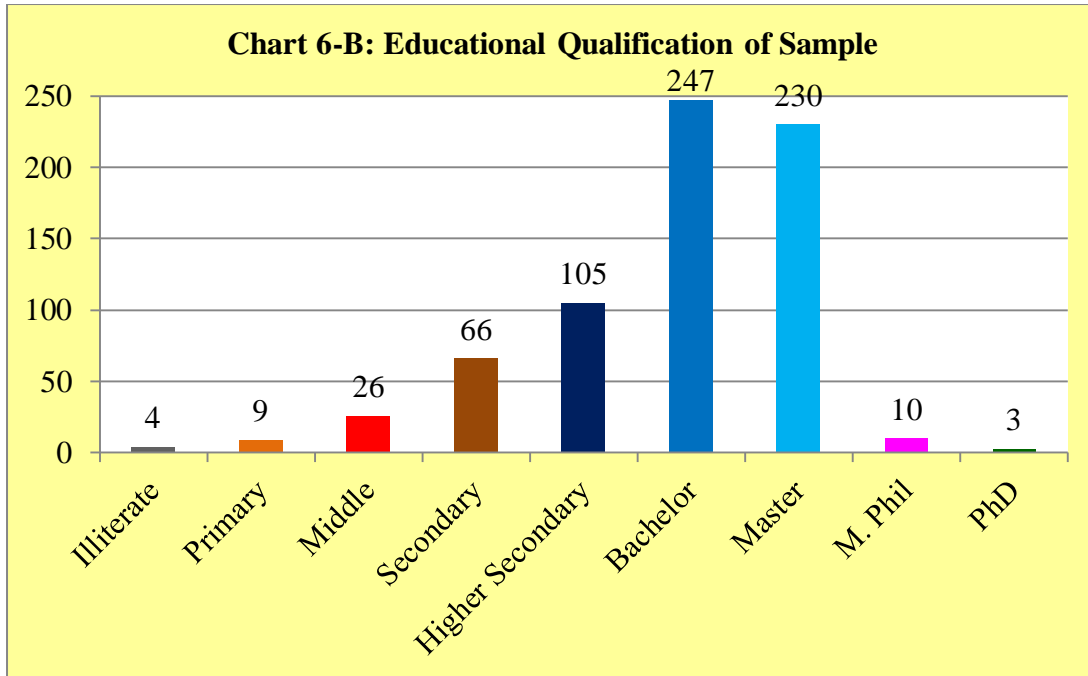
| Age group | Number of Respondents | Percentage |
|-------------|--|------------|
| 14-20 years | 64 (youngest respondent is 14 years old) | 41.7 |
| 20-30 years | 271 | 58.3 |
| 30-40 years | 206 | 100.0 |
| 40-50 years | 109 | |
| 50-60 years | 37 | |
| 60-70 years | 11 | |
| 70-80 years | 2 (eldest of 73 Yrs) | |



Educational Qualification of Sample

Educational qualifications of the sample ranged from illiterate to PhD as shown in Table 6.5 and Chart 6-B. These are the main categories. If we go down to details, a number of respondents had diverse professional education, too. Inter alia, they include educationists, doctors, engineers, lawyers, seismologist, ecologist and pharmaceutical etc.

| Education | Number of Respondents | Percentage |
|------------------|-----------------------|------------|
| Illiterate | 4 | |
| Primary | 9 | |
| Middle | 26 | |
| Matric | 66 | |
| Higher Secondary | 105 | |
| Bachelors | 247 | |
| Masters | 230 | |
| M. Phil | 10 | |
| PhD | 3 | |
| Total | 700 | |



Professions of Sample

The sample belonged to diverse professions. The main categories are given in Table 6.6. Within these main categories, the respondents belonged to dozens of professions.

Table 6.6: Survey-1 – Professions of Sample.

| Professions | Number of Respondents | Percentage |
|--|-----------------------|------------|
| Government officials | 132 | 19% |
| Professionals (including journalists) | 56 | 8% |
| Educationists, NGOs and teaching community | 214 | 30.6% |
| Businessman | 53 | 8% |
| Advocate | 2 | 0.2% |
| Doctor | 7 | 1% |
| Social worker | 14 | 2% |
| Farmer | 18 | 2% |

| Table 6.6: Survey-1 – Professions of Sample. | | |
|---|------------------------------|-------------------|
| Professions | Number of Respondents | Percentage |
| Government officials | 132 | 19% |
| Professionals (including journalists) | 56 | 8% |
| House wives | 44 | 6% |
| Politician | 32 | 5% |
| Authors / historians | 3 | 0.2% |
| Student | 123 | 18% |
| Total | 700 | 100% |

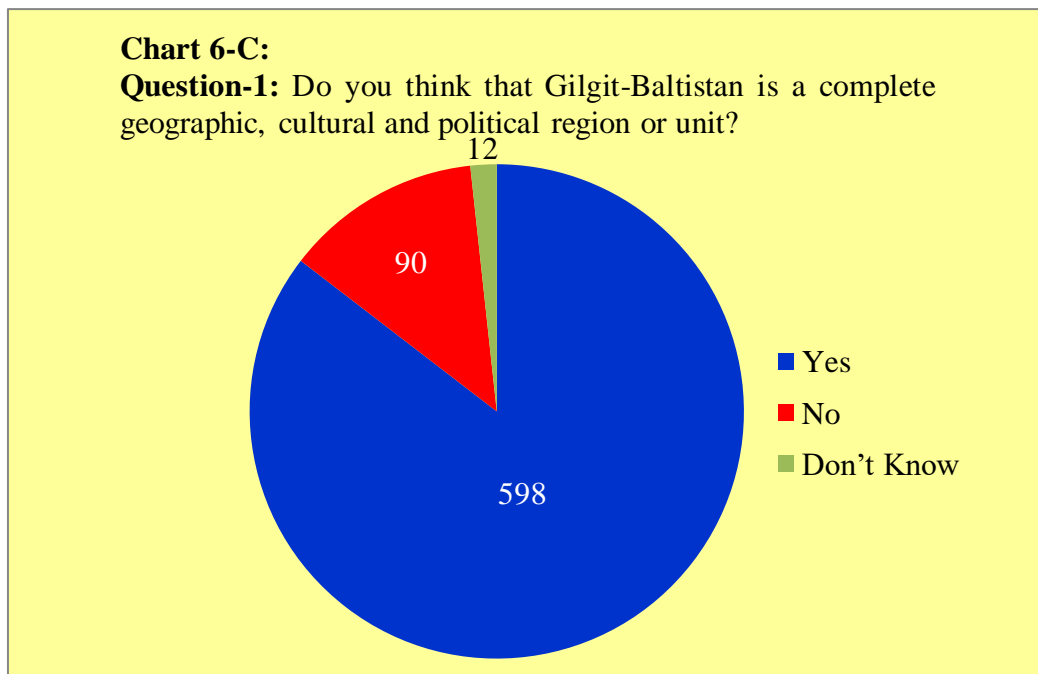
Responses to Survey Questionnaire-1

Question-1: Do you think that Gilgit-Baltistan is a complete geographic, cultural and political region or unit?

It may be seen that an overwhelming majority of GB considers it a complete geographic, cultural and political region. This makes it easier to base our analysis for the human security issues pertaining to GB as a single unit or region.

Table 6.7: Survey-1 – Response to Question-1.

| Response | Number of Respondents | Percentage |
|------------|-----------------------|------------|
| Yes | 598 | 85% |
| No | 90 | 13% |
| Don't Know | 12 | 2% |
| Total | 700 | 100% |

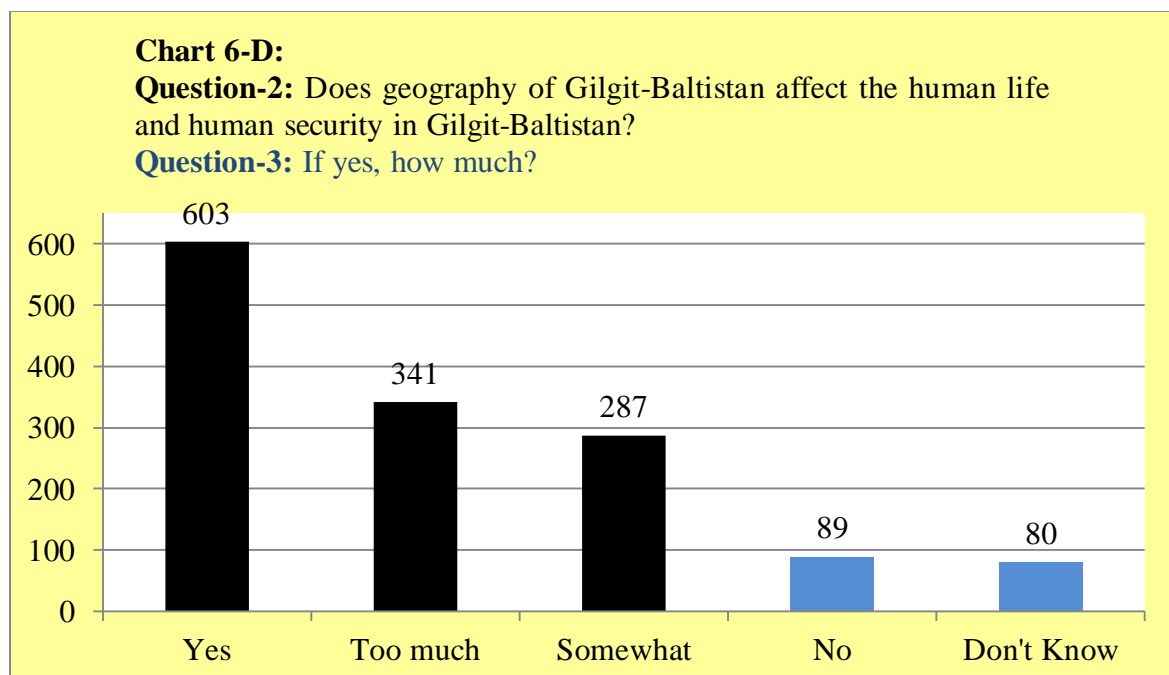


Question-2: Does the geography of Gilgit-Baltistan affect the human life and human security in Gilgit-Baltistan?

Question-3: If yes, how much?

It may be seen that some 86.1 percent people in GB believe that geography affects human security and human life in GB.

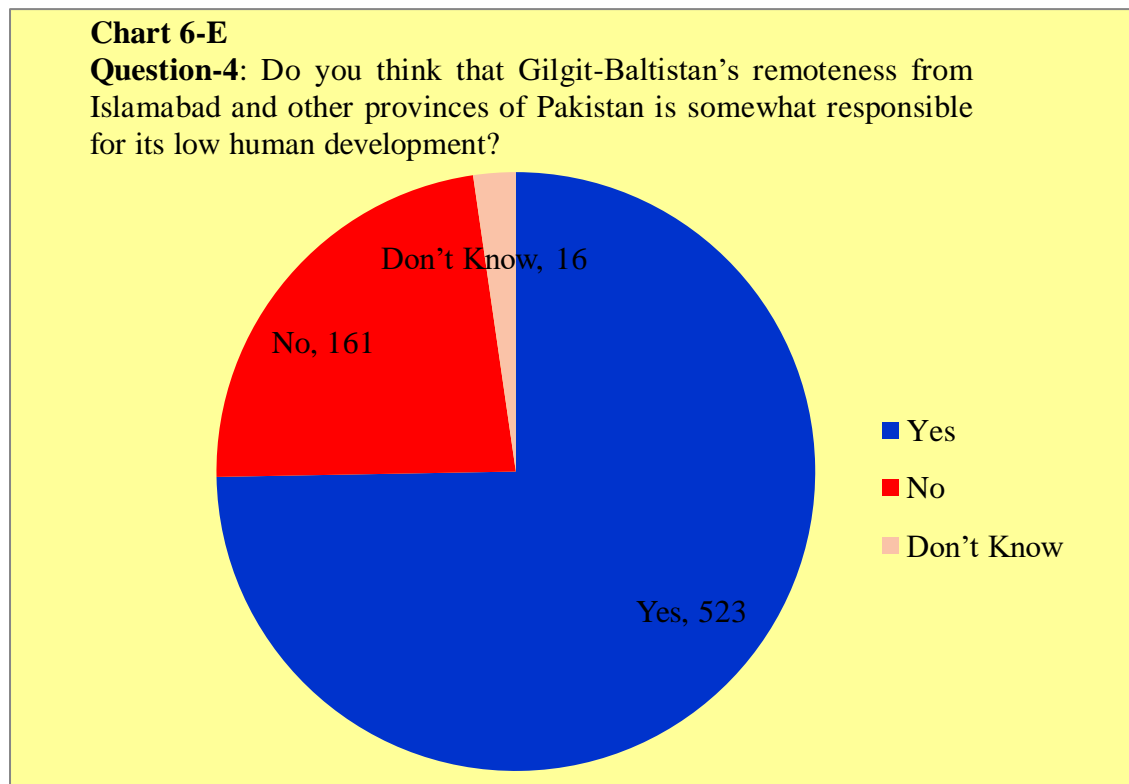
| Response | Number of Respondents | Percentage |
|-----------------|------------------------------|-------------------|
| Yes | 603 | 86.1 % |
| Too much | 341 | 48.7 % |
| Somewhat | 287 | 41 % |
| No | 89 | 12.7 % |
| Don't Know | 80 | 11.4 % |
| Total | 700 | 100% |



Question-4: Do you think that Gilgit-Baltistan's remoteness from Islamabad and other provinces of Pakistan is somewhat responsible for its low human development?

This question was aimed at knowing the public opinion about effects of geographic remoteness of GB. A predominant majority of the region (75%) considers that remoteness of the region is somewhat responsible for its low human development as given in Table 6.9 and Chart 6-E.

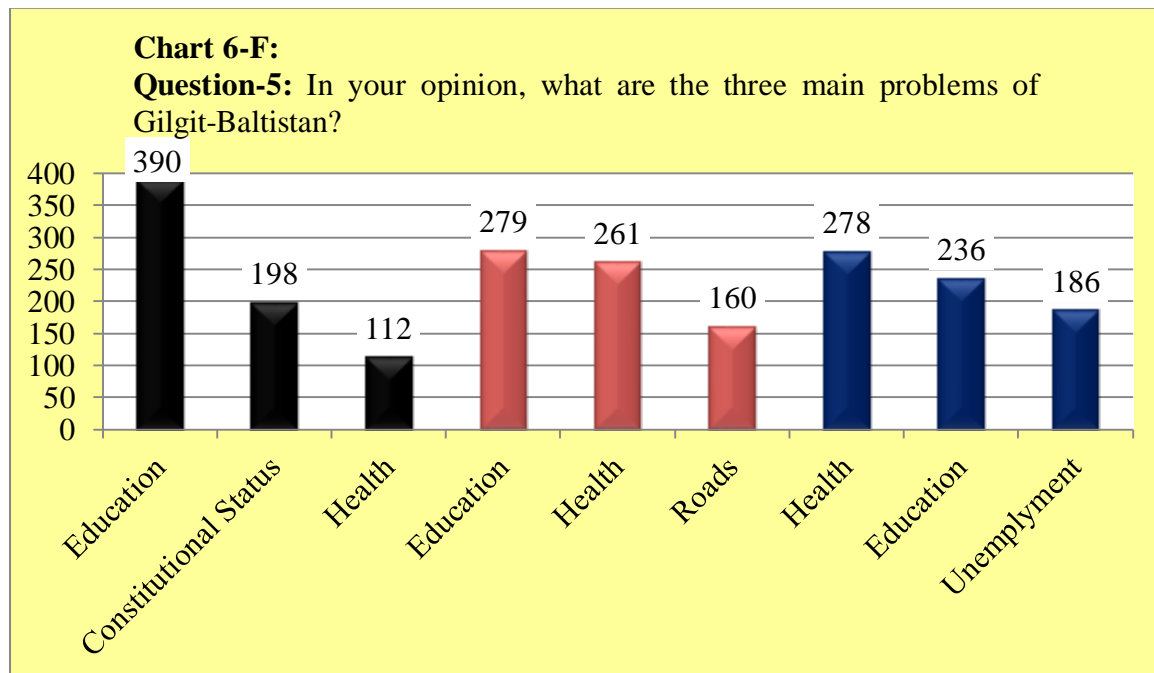
| Response | Number of Respondents | Percentage |
|------------|-----------------------|------------|
| Yes | 523 | 75% |
| No | 161 | 23% |
| Don't Know | 16 | 2% |
| Total | 700 | 100% |



Question-5: In your opinion, what are the three main human security problems of Gilgit-Baltistan?

The response shows education as number-1 human security issue of GB, followed by health, constitutional status, communication infrastructure and unemployment.

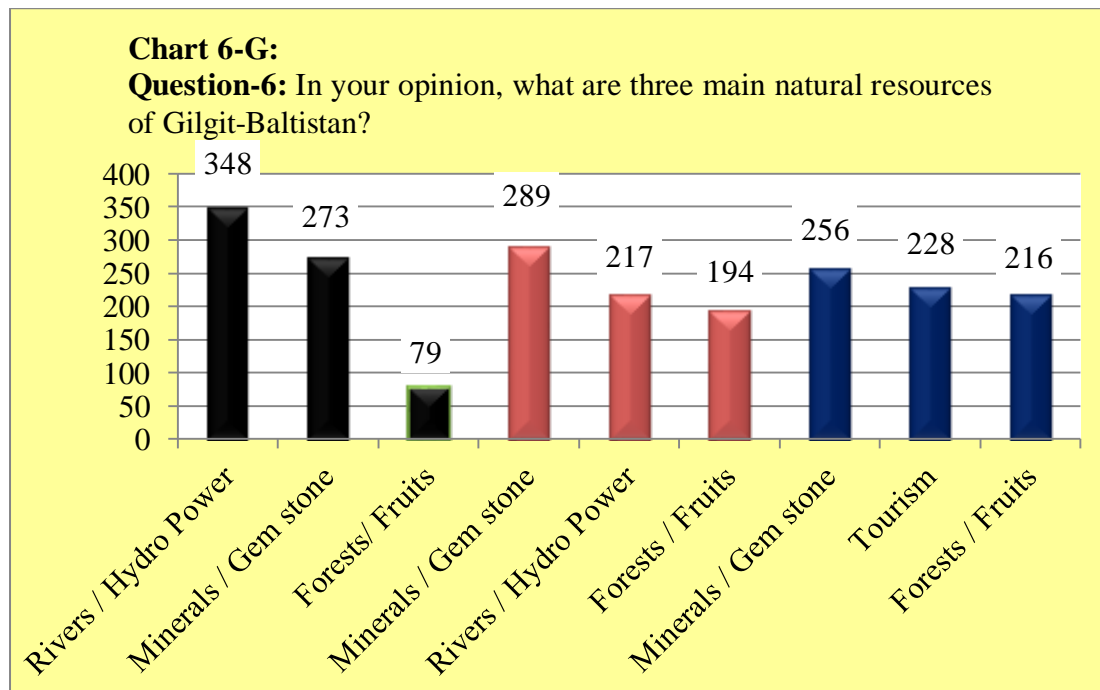
| Table 6.10: Survey-1 – Response to Question-5. | |
|---|------------------------------|
| Response | Number of Respondents |
| Graded as Number-1 Human Security Problem of Gilgit-Baltistan | |
| Education | 390 |
| Constitutional Status | 198 |
| Health | 112 |
| Graded as Number-2 Human Security Problem of Gilgit-Baltistan | |
| Education | 279 |
| Health | 261 |
| Roads / communication infrastructure | 160 |
| Graded as Number-3 Human Security Problem of Gilgit-Baltistan | |
| Health | 278 |
| Education | 236 |
| Unemployment | 186 |



Question-6: In your opinion, what are three main natural resources of Gilgit-Baltistan?

The GB region is full of geographic dividends. Opinion survey shows that water is number-1 natural resource of GB in the form of glaciers, snowfall, rivers and torrents. It is also source of hydropower. Mineral including gemstones, forests, fruits and tourism are yet other sources. All these can become a basis for a very healthy state of human security if utilized by the way of governance and application of modern technology.

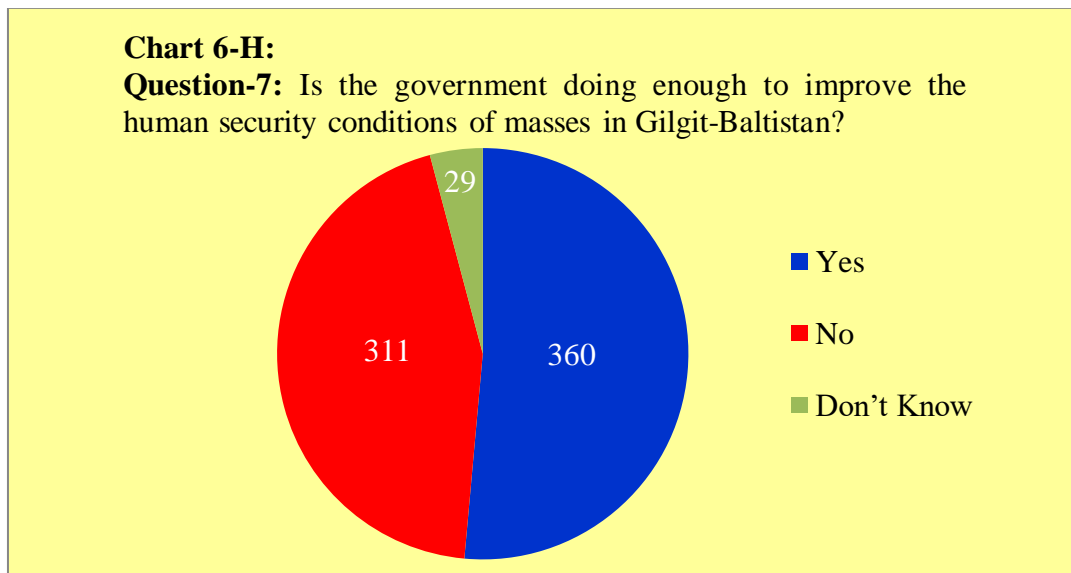
| Table 6.11: Survey-1 – Response to Question-6. | |
|--|------------------------------|
| Response | Number of Respondents |
| Graded as Number-1 Natural Resource in Gilgit-Baltistan | |
| Rivers / Water / Hydro Power / Glaciers | 348 |
| Minerals / Gem stone | 273 |
| Forests / Fruits | 79 |
| Graded as Number-2 Natural Resource in Gilgit-Baltistan | |
| Minerals / Gem stone | 289 |
| Rivers / Hydro Power | 217 |
| Forests / Fruits | 194 |
| Graded as Number-3 Natural Resource in Gilgit-Baltistan | |
| Minerals / Gem stone | 256 |
| Tourism | 228 |
| Forests / Fruits | 216 |



Question-7: Is the government doing enough to improve the human security conditions of the masses in Gilgit-Baltistan?

The view on whether the government is doing enough to improve the human security conditions of the masses in Gilgit-Baltistan is generally balanced between yes and no as given below.

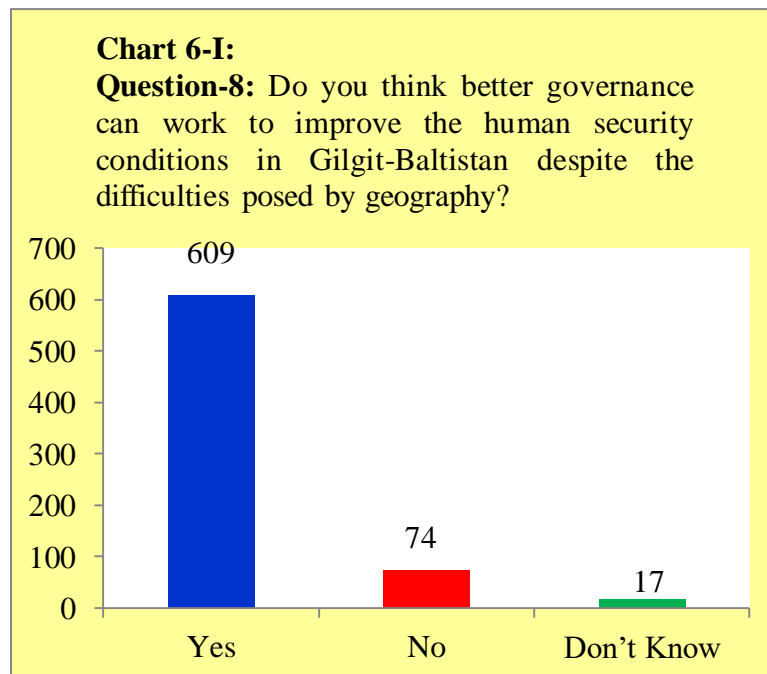
| Table 6.12: Survey-1 – Response to Question-7. | | |
|---|------------------------------|-------------------|
| Response | Number of Respondents | Percentage |
| Yes | 360 | 52% |
| No | 311 | 44% |
| Don't Know | 29 | 4% |
| Total | 700 | 100% |



Question-8: Do you think better governance can work to improve the human security conditions in Gilgit-Baltistan despite the difficulties posed by geography?

In keeping with the theory of geo-humanism, governance is one of the two important remedies of the human insecurities perpetrated by geography, the other being technology. It stands validated at least to the extent of public opinion as per the responses of the following two questions.

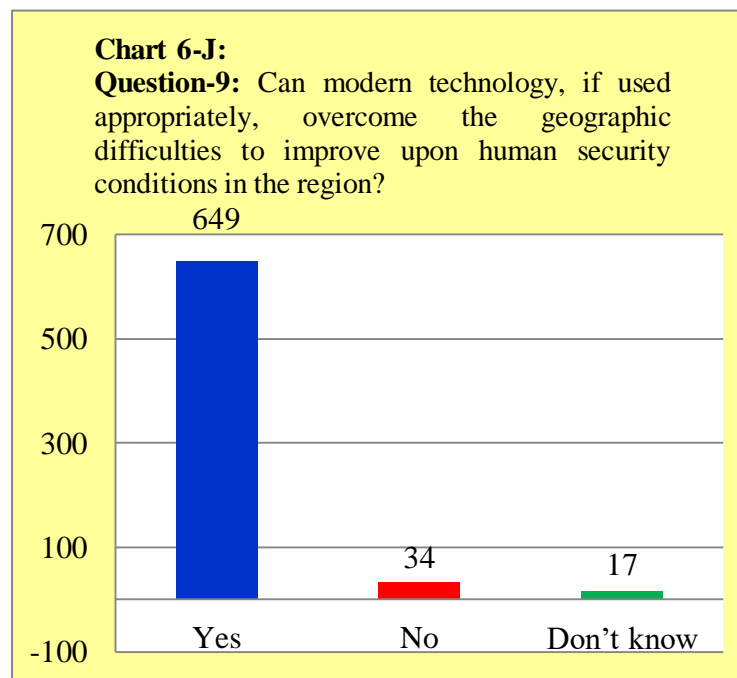
| Response | Number of Respondents | Percentage |
|------------|-----------------------|------------|
| Yes | 609 | 87% |
| No | 74 | 11% |
| Don't Know | 17 | 2% |
| Total | 700 | |



Question-9: Can modern technology, if used appropriately, overcome the geographic difficulties to improve upon human security conditions in the region?

Table 6.14: Survey-1 – Response to Question-9.

| Response | Number of Respondents | Percentage |
|------------|-----------------------|------------|
| Yes | 649 | 93% |
| No | 34 | 5% |
| Don't know | 17 | 2% |
| Total | 700 | 100% |

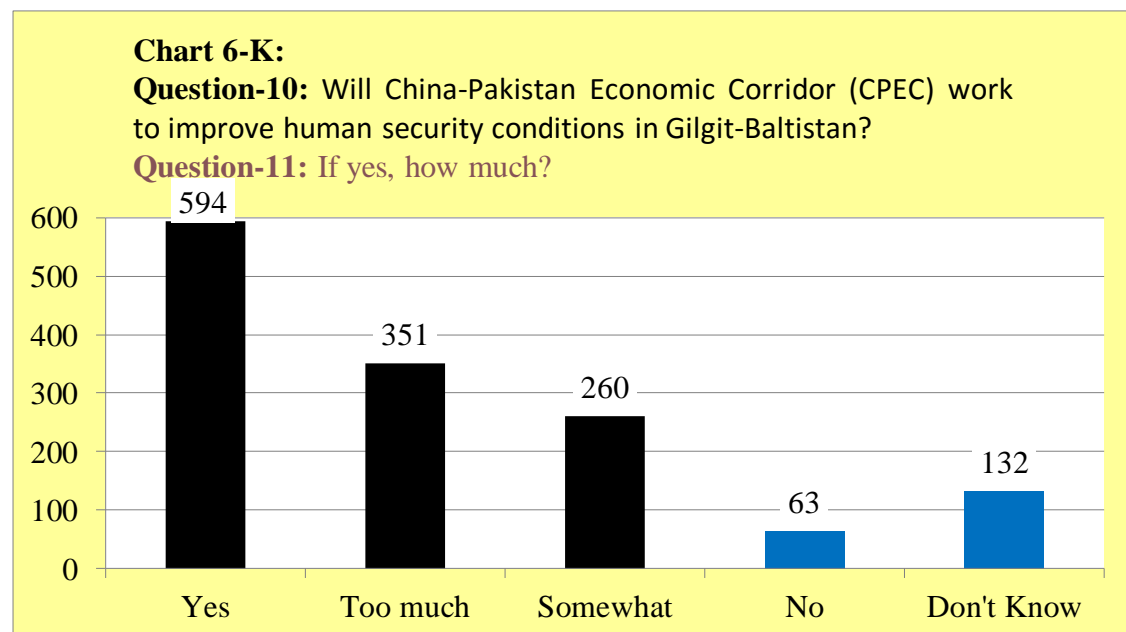


Question-10: Will China-Pakistan Economic Corridor (CPEC) work to improve human security conditions in Gilgit-Baltistan?

Question-11: If yes, how much?

CPEC is expected to play a great role towards improvement of human security conditions in GB and Pakistan at large, notwithstanding the argument between various provinces, political parties and social sections. The people of GB predominantly look at CPEC to contribute towards improvement of human security conditions in Gilgit-Baltistan.

| Table 6.15: Survey-1 – Response to Question-10 & 11. | | |
|---|------------------------------|-------------------|
| Response | Number of Respondents | Percentage |
| Yes | 594 | 84.9 % |
| Too much | 351 | 50.1 % |
| Somewhat | 260 | 37.1 % |
| No | 63 | 9 % |
| Don't Know | 132 | 18.8 % |
| Total | 700 | 100% |

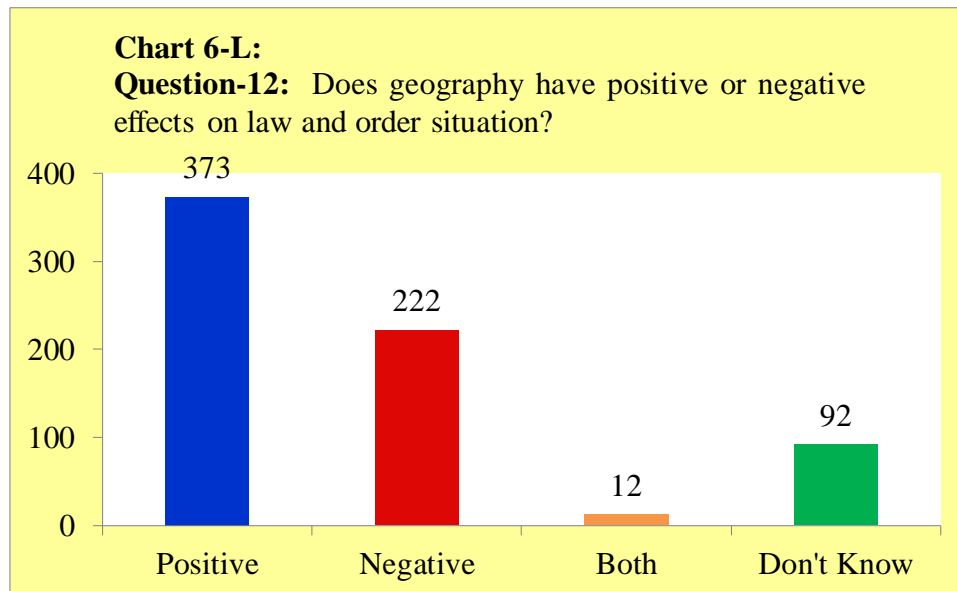


Question-12: Does geography have positive or negative effects on law and order situation?

Geography has its own kind of effects on law and order situation. The people of GB chiefly opine that it has a positive effect. But there are many who feel that it has negative effect. This aspect has been analyzed in the relevant paragraphs.

Table 6.16: Survey-1 – Response to Question-12.

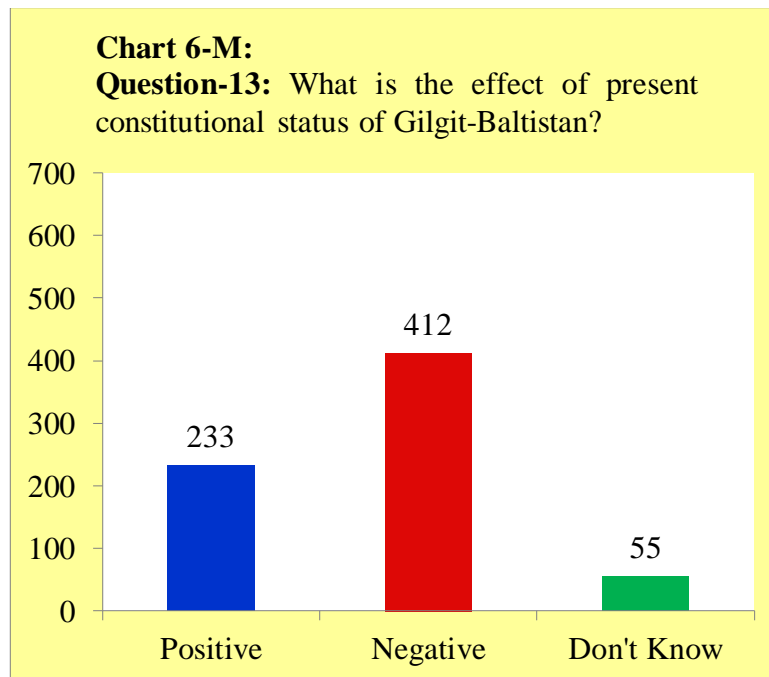
| Response | Number of Respondents | Percentage |
|------------|-----------------------|------------|
| Positive | 373 | 53.2 % |
| Negative | 223 | 31.8 % |
| Both | 12 | 1.7 % |
| Don't Know | 92 | 13.1 % |
| Total | 700 | 100 % |



Question-13: What is the effect of present constitutional status of Gilgit-Baltistan?

Public opinion in GB predominantly believes that the current constitutional status has negative effect. Thus, they have opined for change of status quo. The results of the supplementary survey bear out the fact.

| Response | Number of Respondents | Percentage |
|------------|-----------------------|------------|
| Positive | 233 | 33% |
| Negative | 412 | 59% |
| Don't Know | 55 | 8% |
| Total | 700 | 100% |

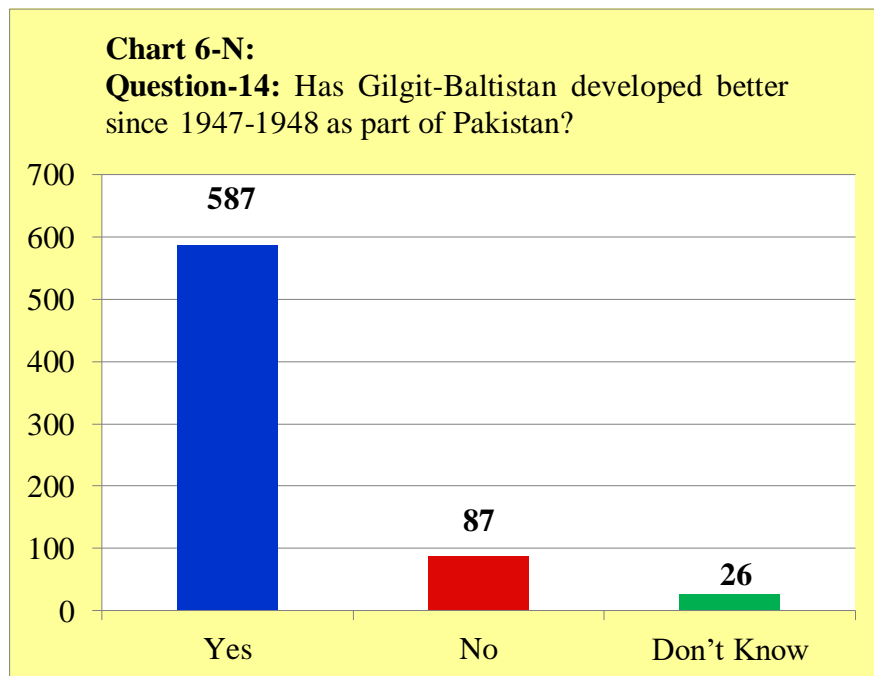


Question-14: Has Gilgit-Baltistan developed better since 1947-1948 as part of Pakistan?

As given in the response below, the fact that Gilgit-Baltistan developed better since 1947-1948 as part of Pakistan, this aspect was corroborated during various interviews also. There are many reasons including accessibility in the form of KKH.

Table 6.18: Survey-1 – Response to Question-14.

| Response | Number of Respondents | Percentage |
|------------|-----------------------|------------|
| Yes | 587 | 84% |
| No | 87 | 12% |
| Don't Know | 26 | 4% |
| Total | 700 | 100% |



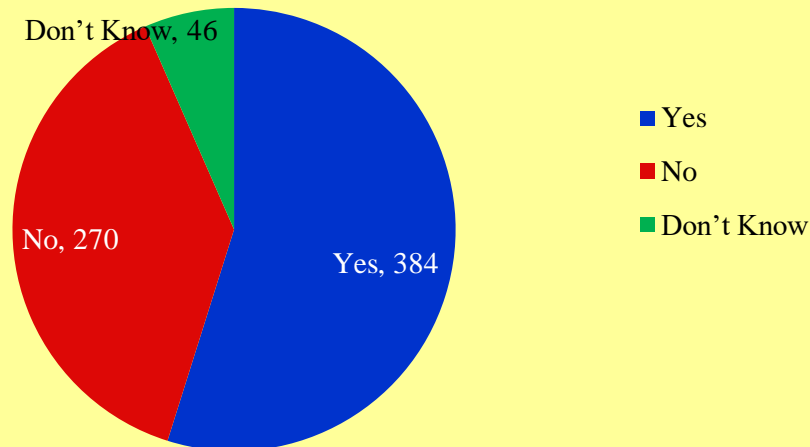
Question-15: Gilgit-Baltistan is still struggling with its constitutional status for the last seven decades. Do you think that it is partly because of geographic remoteness from the national capital and small size of population in it?

Inter alia, this too is one of the effects of remoteness.

| Table 6.19: Survey-1 – Response to Question-15. | | |
|--|------------------------------|-------------------|
| Response | Number of Respondents | Percentage |
| Yes | 384 | 55% |
| No | 270 | 38% |
| Don't Know | 46 | 7% |
| Total | 700 | 100% |

Chart 6-O:

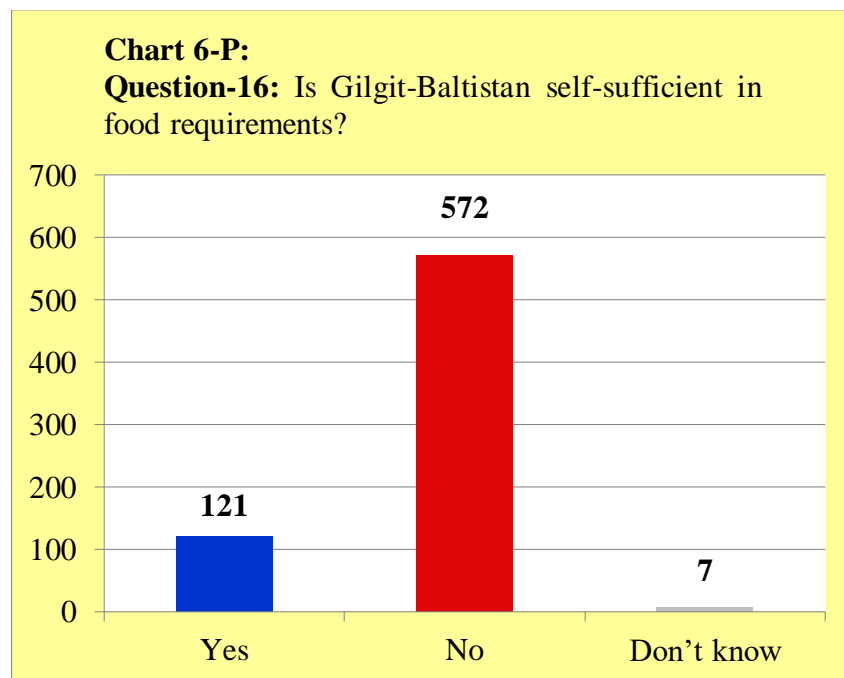
Question-15: Gilgit-Baltistan is still struggling with its constitutional status for the last seven decades. Do you think that it is partly because of geographic remoteness from the national capital and small size of population in it?



Question-16: Is Gilgit-Baltistan self-sufficient in food requirements?

As has been discussed in the relevant pages, GB faces food insecurity due to geographic and climatic environment. The public opinion substantiates it in response to Question-16 & 17.

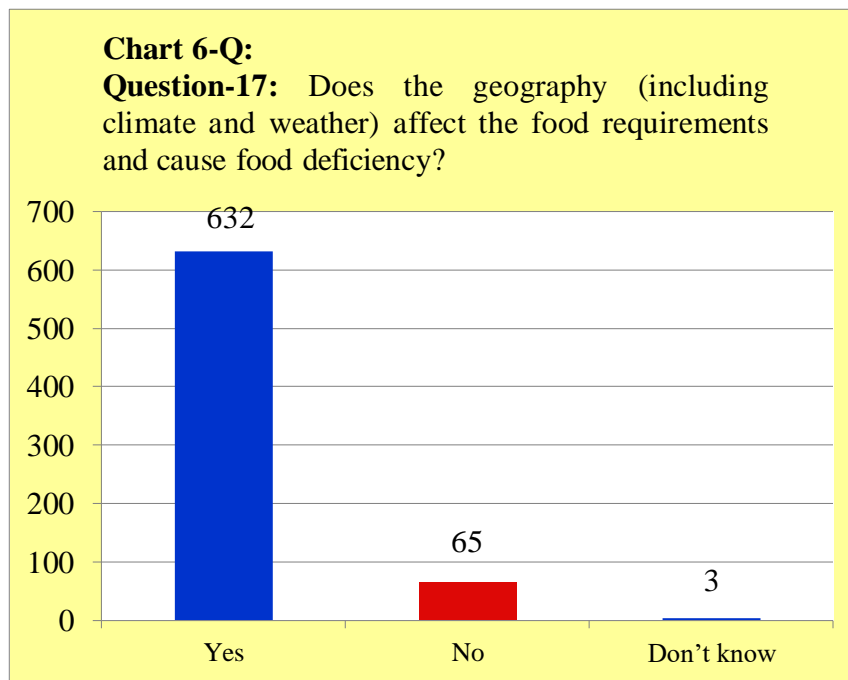
| Response | Number of Respondents | Percentage |
|-----------------|------------------------------|-------------------|
| Yes | 121 | 17% |
| No | 572 | 82% |
| Don't know | 7 | 1% |
| Total | 700 | 100% |



Question-17: Does the geography (including climate and weather) affect the food requirements and cause food deficiency?

Table 6.21: Survey-1 – Response to Question-17.

| Response | Number of Respondents | Percentage |
|------------|-----------------------|------------|
| Yes | 632 | 90% |
| No | 65 | 9% |
| Don't know | 3 | 1% |
| Total | 700 | 100% |

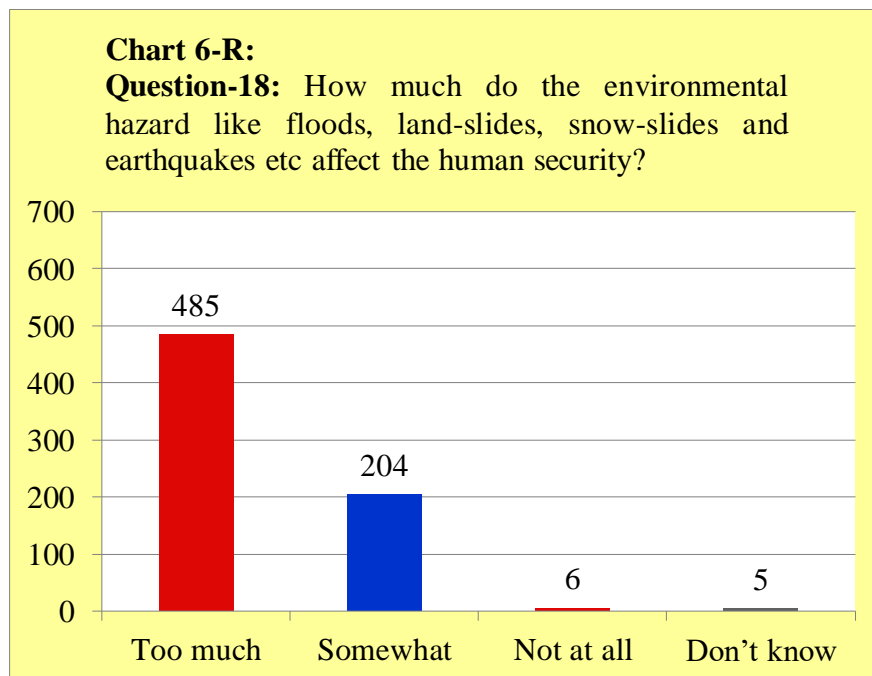


Question-18: How much do the environmental hazard like floods, land-slides, snow-slides and earthquakes etc affect human security?

Environmental hazards are purely a product of geography and climate, and GB is home to many such challenges. The people of GB overwhelmingly feel that the environmental hazards affect the human security in the region.

Table 6.22: Survey-1 – Response to Question-18.

| Response | Number of Respondents | Percentage |
|------------|-----------------------|------------|
| Too much | 485 | 69% |
| Somewhat | 204 | 29% |
| Not at all | 6 | 1% |
| Don't know | 5 | 1% |
| Total | 700 | 100% |



Question-19: Is the culture of Gilgit-Baltistan founded on geography?

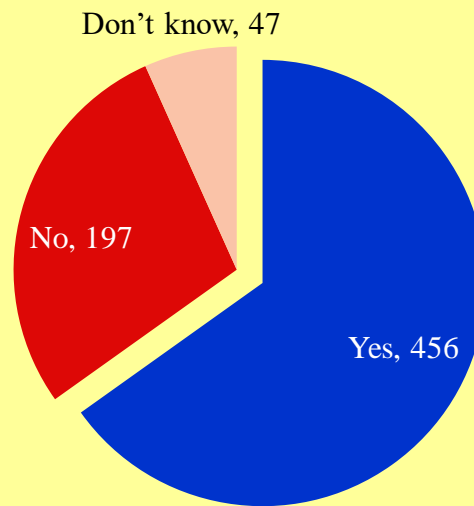
As is the case with most other regions in the world, the culture of GB is greatly influenced by geography. The public opinion also corroborates it.

Table 6.23: Survey-1 – Response to Question-19.

| Response | Number of Respondents | Percentage |
|------------|-----------------------|------------|
| Yes | 456 | 65% |
| No | 197 | 197% |
| Don't know | 47 | 47% |
| Total | 700 | 100% |

Chart 6-S:

Question-19: Is the culture of Gilgit-Baltistan founded on geography?

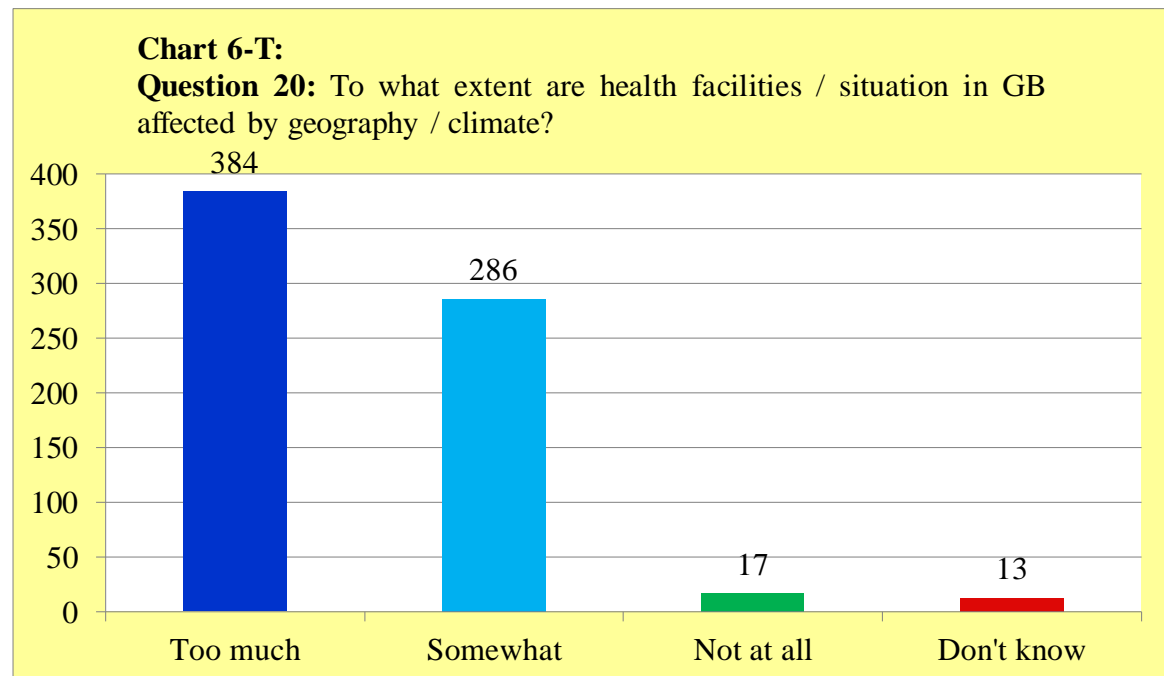


Question-20: To what extent is health security situation in GB affected by geography / climate?

Health security situation in GB is greatly affected by geography and climate as has been discussed in the relevant paragraphs. Some 96 percent people in GB also believe so. The response to Question-20 bears out the same. 55 percent believe that health security in GB is ‘too much’ affected by geography.

Table 6.24: Survey-1 – Response to Question-20.

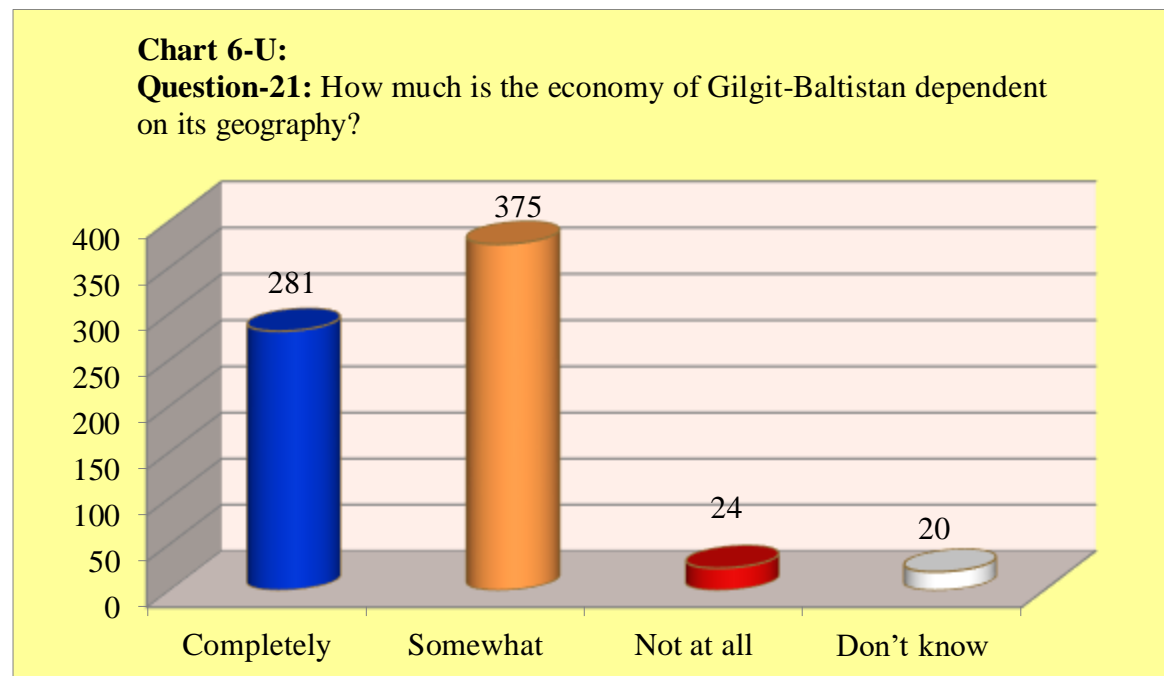
| Response | Number of Respondents | Percentage |
|------------|-----------------------|------------|
| Too much | 384 | 55% |
| Somewhat | 286 | 41% |
| Not at all | 17 | 13% |
| Don't Know | 13 | 2% |
| Total | 700 | 100% |



Question-21: How much is the economy of Gilgit-Baltistan dependent on its geography?

Some 94 percent people of GB believe that economy of the region is dependent on its geography. 40 percent of the total respondents believe that it is completely dependent on geography.

| Response | Number of Respondents | Percentage |
|-----------------|------------------------------|-------------------|
| Completely | 281 | 40% |
| Somewhat | 375 | 54% |
| Not at all | 24 | 3% |
| Don't know | 20 | 3% |
| Total | 700 | 100% |

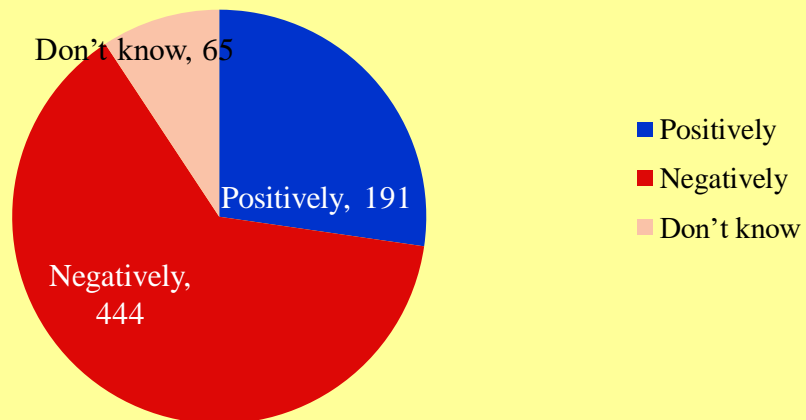


Question-22: How does geography affect job opportunities in Gilgit-Baltistan?

| Table 6.26: Survey-1 – Response to Question-22. | | |
|--|------------------------------|-------------------|
| Response | Number of Respondents | Percentage |
| Positively | 191 | 27% |
| Negatively | 444 | 64% |
| Don't know | 65 | 9% |
| Total | 700 | 100% |

Chart 6-V:

Question-22: How does geography affect job opportunities in Gilgit-Baltistan?

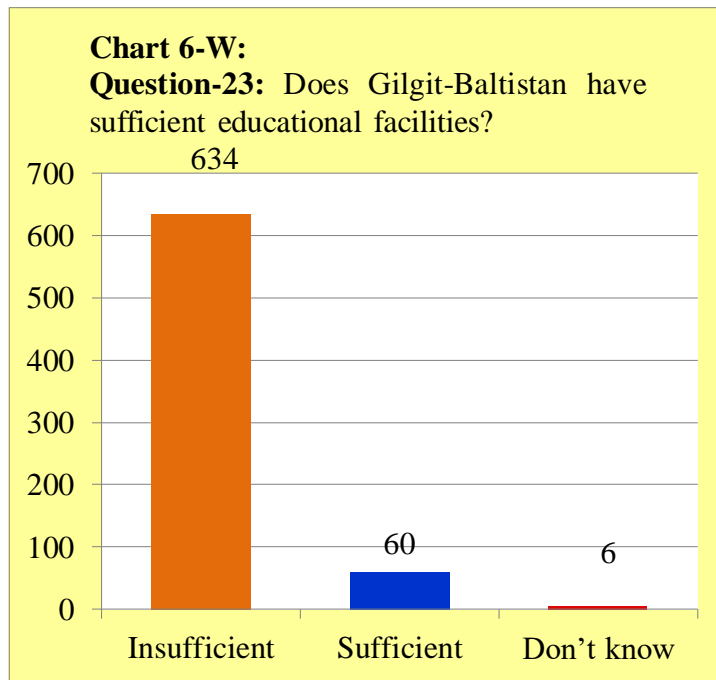


Question-23: Does Gilgit-Baltistan have sufficient educational facilities?

Some 90 percent people in GB believe that educational facilities in the region are insufficient. This too has a linkage with geography, which has been discussed in relevant paragraphs.

Table 6.27: Survey-1 – Response to Question-23.

| Response | Number of Respondents | Percentage |
|--------------|-----------------------|------------|
| Sufficient | 60 | 9% |
| Insufficient | 634 | 90% |
| Don't know | 6 | 1% |
| Total | 700 | 100% |



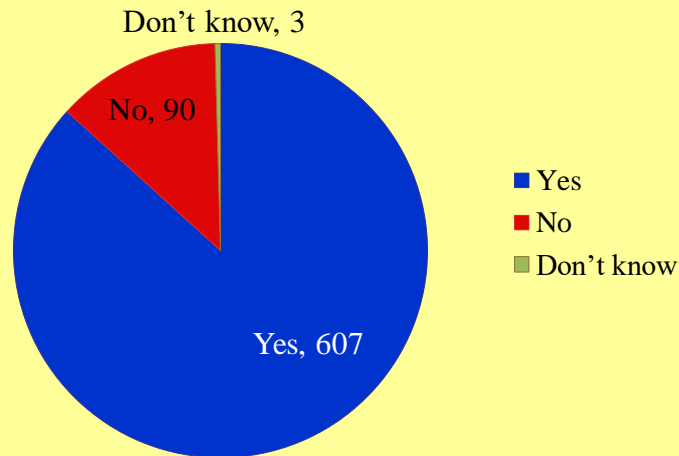
Question-24: Do you think women in Gilgit-Baltistan are over-burdened due to domestic and agricultural work load?

Geography has its own kind of effect on womens' security. Some 87 percent people in GB believe that women in the region are over-burdened due to domestic and agricultural work load.

| Table 6.28: Survey-1 – Response to Question-24. | | |
|--|------------------------------|-------------------|
| Response | Number of Respondents | Percentage |
| Yes | 607 | 12.85% |
| No | 90 | 87% |
| Don't know | 3 | 0.4% |
| Total | 700 | 100% |

Chart 6-X:

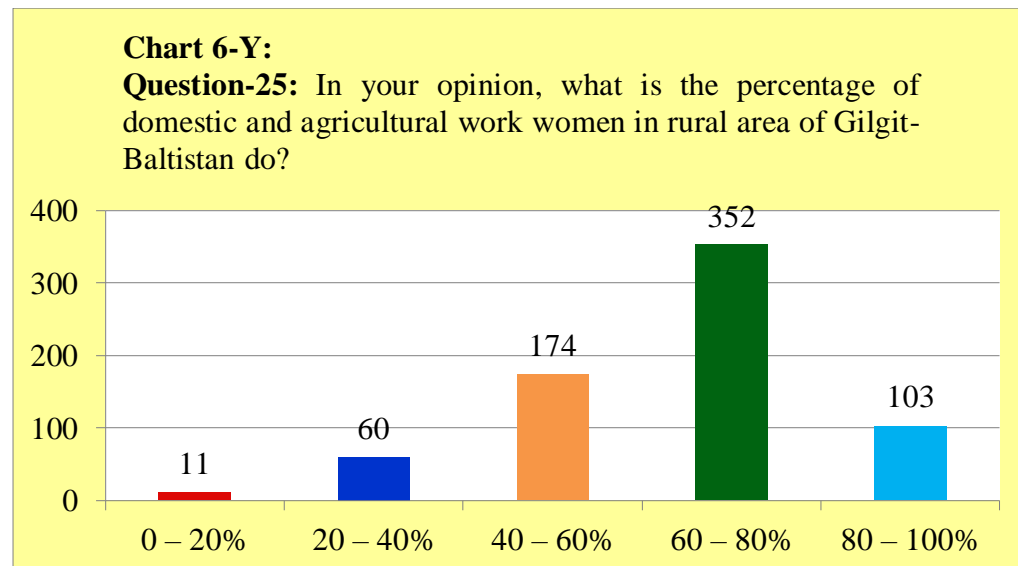
Question-24: Do you think women in Gilgit-Baltistan are over-burdened due to domestic and agricultural work load?



Question-25: In your opinion, what is the percentage of domestic and agricultural work women in rural area of Gilgit-Baltistan do?

On the whole, people in GB think that 67.6 percent of domestic and agricultural work in the region is carried out by womenfolk. However, it differs by region. For instance, percentage of work is less in Hunza and Ghizer and more in Baltistan.

| Response | Number of Respondents |
|-----------|-----------------------|
| 0 – 20% | 11 |
| 20 – 40% | 60 |
| 40 – 60% | 174 |
| 60 – 80 % | 352 |
| 80 – 100% | 103 |
| Total | 700 |



Supplementary Survey (Survey-2)

This survey contained only two questions and pertained to the political security subset of human security. A total of 1,000 forms were initiated out of which 600 returned filled from all ten clusters. The responses were as given below.

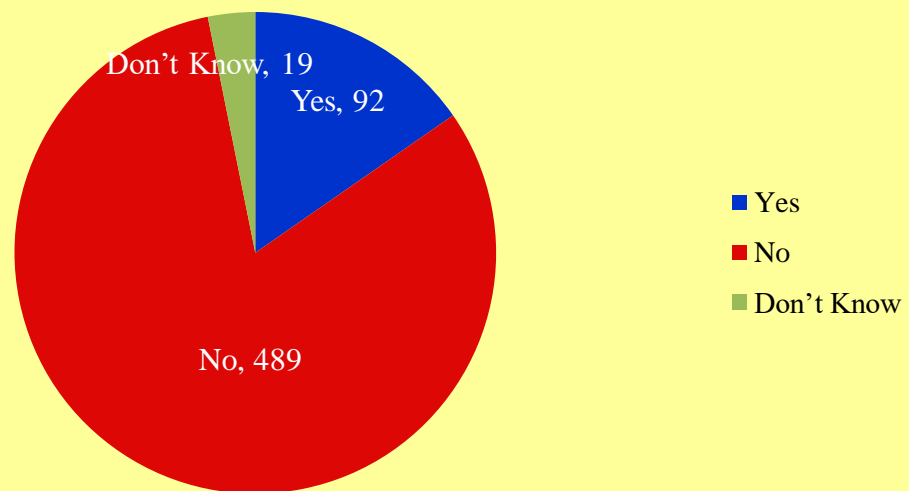
Question-1: Are you satisfied with the existing constitutional status of Gilgit-Baltistan?

82 percent people of GB are not satisfied with the existing constitutional status of the region.

| Response | Number of Respondents | Percentage |
|------------|-----------------------|------------|
| Yes | 92 | 15% |
| No | 489 | 82% |
| Don't Know | 19 | 3% |
| Total | 600 | 100% |

Chart 6-Z:

Question-1: Are you satisfied with the existing constitutional status of Gilgit-Baltistan?



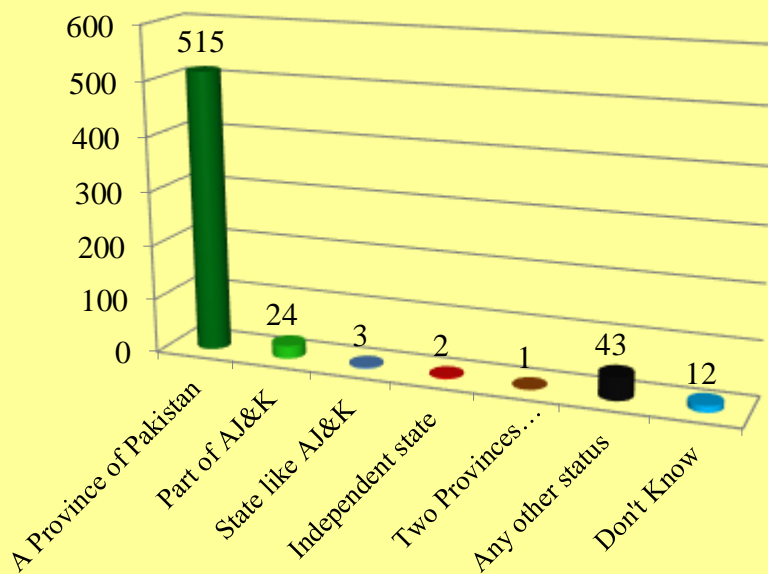
Question-2: What should be the constitutional status of Gilgit-Baltistan?

An overwhelming majority of GB i.e. over 85% demands for attaining the status of a province of Pakistan for GB. The opinion of the remaining respondents is given below. Some 43 out of total 600 respondents (7.1 percent) ticked the column 'any other status' but did not specify as to what this might be.

| Response | Number of Respondents | Percentage |
|------------------------------------|-----------------------|------------|
| A Province of Pakistan | 515 | 85.8% |
| Part of AJ&K | 24 | 24% |
| State like AJ&K | 3 | 0.5% |
| Independent state | 2 | 0.3% |
| Two Provinces Gilgit and Baltistan | 1 | 0.16% |
| Any other status | 43 | 7.1% |
| Don't Know | 12 | 2% |
| Total | 600 | 100% |

Chart 6-AA:

Question-2: What should be the constitutional status of Gilgit-Baltistan?

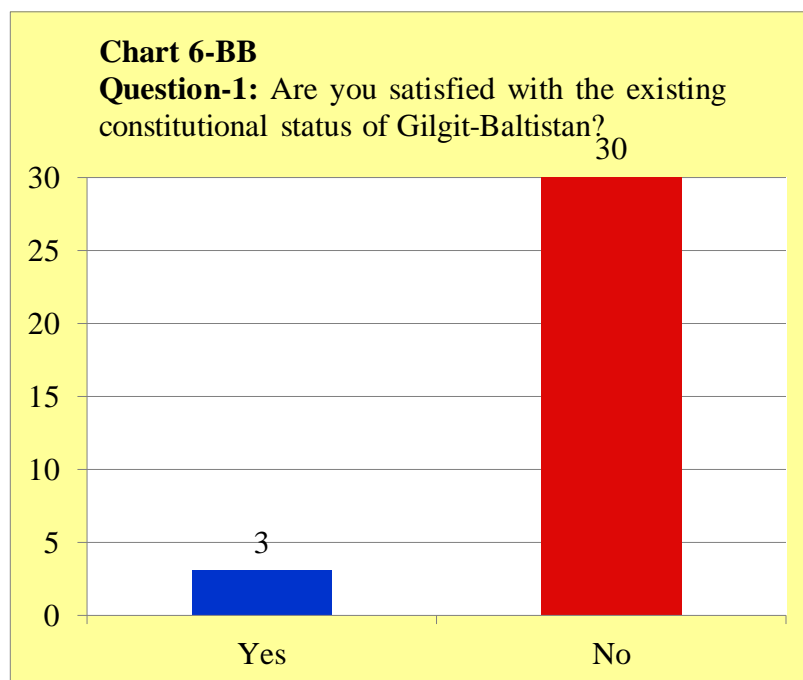


Response from the members of Gilgit-Baltistan Legislative Assembly (GBLA)

It was considered important to know the view of the incumbent members of GBLA on constitutional status of GB. Responses on the supplementary survey containing two questions clearly show two things: (1) Discontent with the present constitutional status; and (2) The urge to see GB as a province of Pakistan. Tables and charts below vindicate.

Question-1: Are you satisfied with the existing constitutional status of Gilgit-Baltistan?

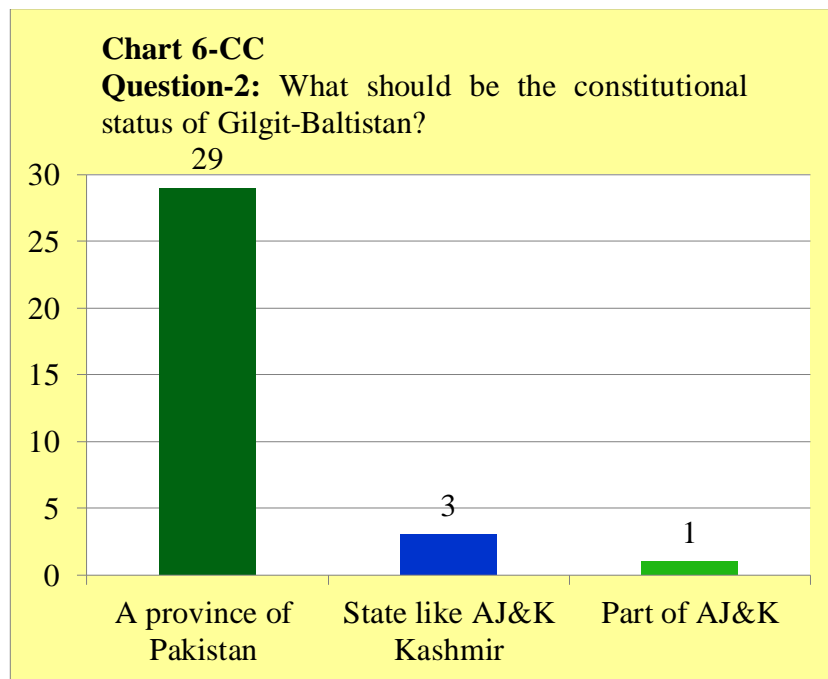
| Table 6.32: Supplementary Survey (Survey-2) – Response of GBLA members to Question-1. | |
|--|------------------------------|
| Response | Number of Respondents |
| Yes | 3 |
| No | 30 |
| Total | 33 |



Question-2: What should be the constitutional status of Gilgit-Baltistan?

Table 6.33: Supplementary Survey (Survey-2) – Response of GBLA members to Question-2.

| Response | Number of Respondents |
|-------------------------|-----------------------|
| A province of Pakistan | 29 |
| State like AJ&K Kashmir | 3 |
| Part of AJ&K | 1 |
| Total | 33 |



Chapter-7

FINDINGS AND CONCLUSIONS

Geo-strategic Significance of GB

Located in the valleys surrounded by the lofty watersheds of Karakoram, Himalaya and Hindukush, the GB region enjoys immense geostrategic significance. It is situated between a triangle formed by China, Central Asia and South Asia, and is surrounded by Xinjiang province of China, Wakhan Corridor of Afghanistan, Ladakh region of the IOK, AJ&K and KPK province of Pakistan. Its distant neighbours include Tajikistan, Aksai Chin and Tibet region of China. Its significance may be gauged from the fact that it is the only region of Pakistan which has a border with China. More so, it overlooks the Ladakh region of the IOK, and severs a linkage between Ladakh and Xinjiang. It is also important for Pakistan from the point of view of water security. Due to the availability of waterways stemming from the glaciated watershed, this region is also known as the ‘water tank of Pakistan’.² The Indus River that provides for geographical definition of Pakistan also enters the country from IOK through Baltistan. The total drainage area of Indus River exceeds 1,165,000 sq km and it is 3,180 km long.³⁴⁴

GB and the CPEC

GB acts as a conduit between various politico-geographic entities in the region, especially China and the remaining parts of Pakistan. The historic Silk Route, KKH and the upcoming C-PEC are its apt manifestations. The CPEC enters Pakistan via GB with some 440 km of KKH located within GB from Khunjrab Pass to Sazin. The CPEC is rightly being seen as an economic game-changer for Pakistan and the region at large. It needs security and stability all along the corridor especially in GB which is a doorway to the corridor. An area with any sort of political instability, economic deprivation, administrative chaos, sectarian undercurrents and sub-nationalist trends cannot be expected to support the activities needed for an international economic corridor.

³⁴⁴ Winston Yu, et al., *The Indus Basin of Pakistan: The Impacts of Climate on Water and Agriculture* (Washington D.C.: The World Bank, 2013), 59.

Communication Problems

The GB region, as a whole, is suffering from communication problem. From the point of view of communication, both road infrastructure and telephony, GB has not entered in the 21st century as yet. Only one telephone company, the Special Communication Organization (SCO), is working in the region. SCO has its own limitations. The vastness of area and thinness of population worsen the issue as the communication is provided on commercial basis. Many of the major valleys and geographic communities are still deprived of telephonic communication. They are still using the mode of letters, by post or by hand, or person borne message.

The Effect of the Karakoram Highway

Till 1947-1948, poverty was pervasive in GB. People were living off the land. People used to put on homemade leather and wooden shoes. Organic food was part of the daily consumption. The speed of human development was too slow. The main reason was the geographic barricade. The conditions have not much changed in case of remote valleys and villages. With enhanced connectivity after construction of the Karakoram Highway and its operationalization in 1978, the human security conditions have changed. KKH has indeed transpired to be a game changer for the people of GB. Not only the human security conditions but even the culture of the region has undergone a major transformation after construction of KKH.

The Problem of Accessibility

Notwithstanding the vitality of KKH, road accessibility to GB remains to be a huge problem area for the region. KKH is the only all weather road that connects GB with other parts and provinces of Pakistan. The access to China, passing over the high altitude pass of Khunjab, is closed during winter. The access to and from Islamabad is closed due to blockade of KKH because of landslides. This happens many times during a year. The access to Chitral over the non-metalled Gahkuch – Mastuj route is also closed. This too passes through the high altitude Shandur Pass. The access to Ladakh vial Skardu-Kargil and Khaplu-Nubra roads is blocked due to the Indo-Pak conflict. The access to AJ&K via Kamri pass, Fulway pass and Shounter pass has not been developed for vehicular traffic albeit the foot movement by the locals from either side continues during summer season. Air movement is also uncertain. There are two airports in GB: Gilgit and Skardu. PIA is the only airliner operating between Islamabad and Gilgit/ Skardu. About 50 percent of flights are cancelled due to

inclement weather and technical reasons. The issue of accessibility is a singular problem that reflects negatively on all aspects of human security.

Geography and International Relations (IR)

Geography has been the substratum of IR in the world since times immemorial. GB is no exception. The geographic importance of GB has put it into the international arena yet again. It is likely to act as the nucleus of IR. This would, in turn, affect the human security state in the region.

Geography and the State of Peace and Conflict

The geography of GB has a strong linkage with the state of peace and conflict in the region. Geography, indeed, acts both ways. It has positive as well as negative effects on the state of peace and conflict. To attain a manageable state of peace and conflict, the state must keep in view the geo-humanistic angles and requirements.

Geo-Politics

The 19th century Great Game between the British Empire and the Russian Empire is an apt example of geo-politics in Asia, of which GB has been a part. Whereas geo-politics continues on the Asian continent between various world powers including Russia, China, the US, India and European countries, GB and Pakistan, at large, cannot remain aloof from it. GB is very much part of the geo-politics on the continent. According to Professor Usman Ali, ‘The Karakoram Highway is under the shadows of demons’.³⁴⁵ In explanation of the term ‘shadow of the demons’ he said that the major powers of the world have unending interests in GB and continue to keep an eye on the Karakoram Highway (KKH). Professor Manzooom Ali believes that an independent and sovereign state based on GB would lead to another great game because of the interests of other countries.³⁴⁶ Geo-politics directly influences the course of geo-humanism.

Geo-Strategy

The GB region has a great deal of geostrategic importance. The period of colonialism drew a lot of interest. The locational dynamics of GB in combination with Chitral, Wakhan Corridor, Askai Chin and Ladakh are of great geo-strategic value for Pakistan as well as the global and regional powers. Geo-strategic imperatives certainly impinge on the course of geo-humanism in the region.

³⁴⁵ Usman Ali, 2016.

³⁴⁶ Manzooom Ali, 2016.

Geo-Economics

The GB region has attained a centre stage in the geo-economic pursuits of the countries of the region. The China-Pakistan Economic Corridor (CPEC) is a direct manifestation of geo-economics in the region. If the region is able to fare well in the way to geo-economics, it is believed that it would work a great deal to facilitate the course of geo-humanism in GB.

Governance Difficulties

Difficulties of geography make the process of governance and administration difficult. The assertion of a government official points to the same fact. On being asked as to how does geography affect the administrative performance of government departments, Rehman Shah, Deputy Commissioner District Shigar said:³⁴⁷

As compared with plains, administration is difficult in the mountainous areas because of accessibility issues. Because of lack of state presence in remote areas, non-state entities like clergy have more roots in the society. They often resist to the governance initiatives on the basis of religion. It becomes difficult to introduce something new.

Geo-Humanism in GB

The GB region manifestly epitomizes geo-humanism – the role of geography in human security. Geography casts a shadow on all facets of human security either as an impediment or expedient. Actually, the solution to the human security issue of the GB region lies in a comprehensive geo-humanistic approach.

Geography remains to be the overriding factor that influences the human life in Gilgit-Baltistan, thus pointing to geo-humanism. Governance inadequacies and weak application of modern technology are tantamount to preserving the impedimental role of geography in human security in GB. A number of major conclusions emerge from the discussion on the issue in the preceding chapters, some of which are being given herein.

Geo-Humanism in Recent History in GB

After 1947-1948, due to better connectivity, GB has seen great cultural transformation, and the state of human security has improved. There is a popular narrative that the Dogra regime of Kashmir invaded GB in 1840 and continued their tyrannical rule for the following 108 years. Wazir Jaffar disagrees. He believes:³⁴⁸

³⁴⁷ Rehman Shah, Deputy Commissioner District Shigar (2015-2016), Interview by author, February 18, 2016.

³⁴⁸ Jaffar, 2015.

Before the Dogra rule, the locals did not own land. The local Raja could ‘bless’ anyone with land or else deprive him. Raja could transfer the land of one person to another purely on personal likes or dislikes. History tells us that the great Balti ruler Ali Sher Khan Anchen conquered area up to Chitral. But what benefit did the people of GB reap? Did they get additional schools, hospitals, roads or facilities? Indeed, not. They only served the local royal families, suffered for them and even died for them. People remained in three types of servitude: mental, physical and land. But the royal families enjoyed all the benefits. Their regime extended in time and expanded in space.

The state of health and education has been no different. There were no proper health facilities in the region. With regard to education, the *Akhund* (Persian word for religious cleric) of the village used to teach the Holy Quran, *Gulistan-e-Saadi* and *Bostan-e-Saadi* (two books authored by an Iranian scholar Abū-Muhammad Muslih al-Dīn bin Abdallāh Shīrāzī aka Sheikh Saadi). Someone who had studied *Gulistan* and *Bostan* used to be considered as a well read person. Some people used to go to Iran but most of them to Najaf Ashraf in Iraq to become Sheikh or Alam. On the other hand, Akhund used to be a locally educated religious teacher or imam.

A number of people from GB are studying in the *madaris* of Iran and Iraq even now. One such student, during an interview with the author while on leave in Pakistan stated, ‘There are about 1,000 Pakistan students at Najaf Ashraf in Iraq. About 250-300 of them hail from GB. The students go to Iran for 15 to 20 years of education before repatriation. Religious education cannot be completed in fewer years than this tenure.’³⁴⁹ He also told that before going to Iraq in 2005, he had studied in a madrassa at Mashhad in Iran, and even before in Madrassa al-Mehdi at Karachi. During the Buddhist era, people used to go to Tibet for religious education. It used to take a long time. Sometimes, a person used to return to Baltistan after 30 years on completion of his Buddhist education in Tibet.

The Rajas supported education in Akhund’s house but not the establishment of a proper school system. The common people were not allowed even to put on white clothes. On any sort of violation of Raja’s state rules, people were punished arbitrarily. People used to be imprisoned, expelled from the village or even exiled from the state. Some of them used to be fined in terms of wheat, animals or gold

³⁴⁹ Sheikh Muhammad Ali, Student of Islamic Studies at Najaf Ashraf in Iraq. Hails from Seno village in Upper Braldu valley of Shigar district, Interview by author, Skardu, March 30, 2016.

because there was no currency. The exiled person's land was confiscated. However, Rajas set up a system of agricultural and irrigation.

Some of the Sheikhs (ulema) used to be against English education, against women's literacy and against even the religious education of women in the village seminaries. Now, during the last couple of decades, the approach of the society towards women's education has changed. The ulema who used to consider the women education as haram (illegitimate) have died or are no more relevant.

Human Security during Dogra Rule

There are contending points of view with regard to human security conditions during the Dogra rule. Most of the common people in GB think that the Dogra rule was inherently tyrannical, and that after liberation in 1947-1948, the process of human development in the region accelerated. A number of historical books have referred to the state's tyranny and terrorism against the citizens in various forms. Yousaf Hussainabadi maintains that the Dogra rulers forcibly levied huge sums of money from the citizens of the state to make up for the 7.5 million Nanakshahi that they had paid to the British in compliance with the Treaty of Amritsar of March 16, 1846. On refusal or inability of the people to pay their rulers, they were treated so mercilessly that in some cases even the skin of the protestor was removed from his body alive.³⁵⁰ There are competing viewpoints in this regard.

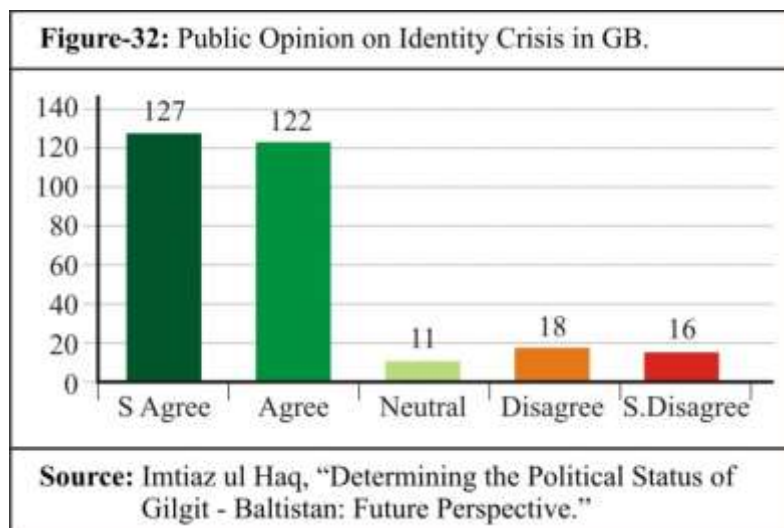
To cite one, according to Wazir Muhammad Jaffar from Shigar, the Dogras introduced a proper state system in GB. Lands were transferred in the name of natives i.e. land ownership rights were given. They established schools, small hospitals, post office system, roads and tracks, police system, forest system and various other departments. They also appointed a *wazir-e-wazarat* equal to deputy commissioner. *Wazir-e-wazarat* used to switch office between Ladakh and Baltistan for six months each during summer and winter respectively. The Dogras used to tax the natives in the form of wheat and money. They systemized tax to the dislike of local people. They created a *begaar system* whereby their officials such as *wazir-e-wazarat*, police personnel and revenue officers used to visit various areas at the expense of natives. The people of the village were required to arrange for their conveyance, carriage of luggage and food on turn by turn basis. Yet, Wazir Jaffar upholds that 'Dogra rule was much better than the Raja's rule in terms of standard of life and human security.'

³⁵⁰ Hussainabadi, 2015.

Wazir Jaffar also said, ‘After Pakistan’s creation, it is like living in the paradise. We have all the facilities available in the US’.³⁵¹

Political Security and the Crisis of Identity

Geography has hitherto played a pronounced role in political security and the current constitutional status of GB. The vast expanse of physical geography and the nature of human geography having thin population segmented along ethnic, linguistic, sectarian and geographical lines has played a definitive role in political security. The region has by and large suffered from political deprivation when compared with the other parts and provinces of Pakistan. Due to this, the people of GB are enduring the problem of national identity. They ask if they are Pakistani or not? If yes, then why is GB not part of the constitution of Pakistan? Which province of Pakistan do they belong to? GB is certainly not a province. A former survey on a question ‘People of Gilgit-Baltistan face identity crisis due to undetermined political / constitutional status’ established that some 85 percent people were not satisfied with the state of affairs and believed they were facing an identity crisis. Some 12 percent did not consider there was any identity crisis and 3 percent were neutral or did not wish to answer the question. Figure-32 illustrates.³⁵²



Economic Security

Geography is the basis of economy in all regions of the world. GB is no exception. Certainly, agriculture is the backbone of economy in plains and deserts. It

³⁵¹ Jaffar, 2015.

³⁵² Imtiaz ul Haq: 92.

is different in case of mountainous regions. The agricultural sector in GB, especially the food crops, has a limited capacity to contribute towards economic security. Even the livestock breeding cannot go beyond certain limits due to deficiency of fodder during winter. Yet, geography can serve as the basis for economic security in GB. The region has abundant natural resources in the region. A lot of precious gems are being explored, excavated and taken out of the region.

Mining, both legal and illegal, is not being controlled or overseen properly. Most of it is done illegally. If strictly regulated, it can contribute significantly towards economic security of the region. Other dividends of geography on the way of economic development are the locational dynamic which can facilitate trade (CPEC is an example), water and power sector with royalty on electricity generation, and tourism. All three can meaningfully contribute on the way to economic development in GB.

At the moment, GB's revenue generation is not enough to support its economic needs. The GB government is not allowed to levy taxes in many spheres. Some of the tax revenue goes to the federal government. People also challenge federal taxes with the argument that GB is not a constitutional part of Pakistan. There have been tax-related protests by traders in GB wherein a popular slogan was: Give constitutional rights, get taxes. Likewise, tax concessions have also been extended to the region because of its special constitutional status and the low level of development. For instance, custom non-paid (CNP) vehicles are allowed in GB, which contribute towards further depletion of revenue resources of the region.

Food Security

Domestic production of food grains is the basis for food security in a given geographic region. The geography and climate of Gilgit-Baltistan makes food grain sufficiency difficult to attain. Local agriculture cannot meet the requirements of increasing population. Food insecurity does exist in other parts and provinces of Pakistan, too. However, the difference is that of the causes and the population size. For instance, in the Punjab province, food grain is being produced sufficiently not only to meet the requirement of the local population but also to export to other provinces of Pakistan and abroad. Thus, food insecurity exists among individual households primarily due to economic insecurity. Thus, it is affordability rather than availability that causes food insecurity. The case of GB is different. GB is enduring food insecurity as a region, the nature of geography and climate being the sole reason.

The region does not produce food grains sufficient to feed the population of the area. Increase in population is causing further strain on the agricultural produce and other food resources. It points to geo-humanism.

Personal Security

Geography of GB has both positive and negative effects on personal security, law and order, and peace and conflict in GB. It is easy to control the thin density of population living in small geographical communities with the exception of the major towns. However, it is equally difficult for the law enforcement agencies to react on time in case of emergency. During some of the past events, for instance the wave of sectarian violence in 1988 and 2005-06 in which many people were killed cold-bloodedly, the security agencies could not make a timely impact to control the situation. This calls for state response on geographic basis.

Community Security

GB is made up of dozens of geographic communities inhabiting valleys of varying sizes located apart from each other. Most of the social and economic issues are community-based. Thus, the dream of human security and socio-economic development can best be taken care of by concentrating on communities. The concept of civic life cannot be applied to these geographic communities akin to urban areas. Take the example of Gultari tehsil in Skardu district, which has 32 villages. It remains cut off from Skardu as well as Astore for nearly six months every year due to closure of passes. The case of Shimshal, which has four villages, is no different. Many other geographic communities are also living in geographic isolation. So, community security has to go by the way of community-focus.

Environmental Security

GB is home to a number of environmental hazards as has been discussed earlier. The entire region is indeed hazard-prone. Environmental insecurity is a geographic impediment to human security and development. However, good governance and appropriate use of modern technology can minimize the chances of hazards being converted into disasters. More so, the damage and devastation caused by environmental insecurity episodes can be mitigated. Planning on scientific lines is of the essence.

Womens' Security

The security of women in GB as a gender group does have a linkage with geography. The opinion survey conducted in this regard has corroborated the fact that

womenfolk are overburdened due to domestic and agricultural work especially in rural areas. Certainly, it has a geo-humanistic linkage due to the type of geography and the imperatives of human life. It also affects the childrens' security as the mothers seldom get time to feed their children properly and nurture them well. Similarly, the education of girls is also seriously affected as they get committed to their domestic and agricultural responsibilities right from childhood.

Water and Energy

GB is known as the water tank of Pakistan due to its contribution in the water security of the county. Water is security of human and animal life in the GB region itself too. Balochistan has a similar geography – vast in expanse but thinly populated – however, it lacks water. Hence, the human security and development process therein is demanding. In case of GB, water is a vital source. The 40,000 MW declared hydro power potential and even more yet-to-be-declared capacity is a human security treasure for GB. If developed, it can work to light the entire state of Pakistan including GB but can also enhance economic security by means of royalties paid to the GB region. However, the state of energy-related projects in GB is not really promising. Even the 255 MW energy requirement of the GB region itself is not being met from the existing generation capacity.

Effects of Geography on Media and Information

The extended distances within GB and remoteness of the region has considerable effects on the information sector, including media activities. In the first place, the passage of information is obstructed due to geographic barriers, remoteness and the weakness of communication infrastructure and information system. A few national newspapers arrive in Gilgit and Skardu, the two largest towns in the region, the same day only if the Pakistan International Airlines (PIA) plane operates. If not, it may take up to 48 hours to reach Gilgit or Skardu, that too if the Karakoram Highway is open and the road traffic is not suspended. Even the regional newspapers of GB, which are published only in Gilgit due to availability of presses there, reach Skardu the next day. National newspapers and magazines seldom reach the remote districts and far-flung valley of the region.

Several distant geographic communities have no access to the media – print, electronic or social. All newspapers are published in Gilgit. Printing press machines do not work in Baltistan region due to low temperatures during the winters. This in turn delays the delivery of newspapers in far-flung valleys. The Gilgit-printed

newspapers even reach Skardu the next day, that too if Gilgit-Skardu Road is not closed due to slides. According to Muhammad Qasim Naseem, ‘Due to geography, the intervention of the media in GB has been very little and very late. Due to this, the local culture was saved to a great extent in its real form’.³⁵³ Thus, media does not have much outreach in GB due to geographic difficulties and it does not help take the information out to the remaining world.

Geography and the Dispensation of Justice

Geography has its impact on judicial proceedings too. During an interview, a senior judge from GB stated, ‘Geography does not inhibit the dispensation of justice. However, due to longer distances and travelling time, people of the remote valleys often get late from court hearings. The courts do give them allowance for travelling time, but they do face difficulties in judicial proceedings.’³⁵⁴

Effects of the Remoteness of GB

According to Bahadur Ali Salik, a senior journalist from Baltistan, ‘GB faces serious problems because of its geographic remoteness. Communication means are insufficient. It takes a lot of time to reach GB by road. People feel scared. All weather aircraft are not plying. To do away with remoteness, two things should be developed: industry and tourism. There is a lot of potential for power generation, which can act as backbone of industry. Culture should be promoted. Tourists will come to see the culture of Baltistan.’³⁵⁵ Mr Salik is right. Access to GB because of uncertain communication means is one of the main issues of GB. Private airlines should also be allowed to operate in GB. More hotels are needed. Better transport to and within GB is needed.

On the issue of GB’s remoteness, Syed Mehdi Shah, Chief Minister of GB from 2009 to 2014, during an interview with the author, said, ‘The state of human security in Gilgit-Baltistan has a linkage with its remoteness. If GB was close to the national capital or inside Punjab province, it would have had a better state of human security’.³⁵⁶

³⁵³ Naseem, 2015.

³⁵⁴ Ali Baig, District and Session Judge, Diamer, Interview by author, Skardu, March 16, 2016

³⁵⁵ Salik, 2016.

³⁵⁶ Shah, 2016.

Chapter-8

RECOMMENDATIONS

Based on the discussion in the preceding chapters, the following are recommended:

Political Security

Pakistan cannot withdraw from its principled stance on Kashmir and must continue to provide strong political, diplomatic and moral support to the people of Kashmir on all national and international forums. However, since a plebiscite on the issue of Kashmir is not in sight in the near future due to the inflexibility of India, therefore Pakistan may conduct referendum in GB with regard to the political future of the region. It may be held under the eyes of the international observers including the UN.

Gilgit-Baltistan Empowerment and Governance Order 2009 is a comprehensive administrative package for the current political status of the region. In order to do away with the political deprivation, constitutional limbo and thus identity crisis in GB, an all-inclusive constitutional package is required to replace this 2009 package according to which GB should be given Provisional Provincial Status pending the settlement of the Kashmir issue along with related measures as follows: (1) Representation in the National Assembly of Pakistan proportionate to population. One seat per district (comes to a total of 10 National Assembly seats) is recommended. More seats for the larger districts may be worked out; (2) Representation in the Senate in line with the seats of other provinces. The Senate seats of all provinces may be rationalized; (3) Abolition of GB Council; (4) Re-designation of GBLA as GB Provincial Assembly, like other provinces; (5) The sphere of authority or influence of KA&GB ministry would end insofar as GB is concerned; (6) Extension of jurisdiction of Supreme Court of Pakistan to GB; (7) Establishment of GB High Court and lower judiciary akin to other provinces; (8) Representation of GB in NFC Award and other national awards and accords; (9) Direct share in PSDP as is the case of other provinces; (10) Representation in the Council of Common Interests (CCI); (11) Representation in the National Economic Council (NEC); and (12) Royalty and share of net profits in the generation of hydro-electricity. A constitutional amendment to this effect by the parliament of Pakistan is recommended.

The Standard of Governance

The standard of governance in GB remains below par when compared with other provinces and with the human security requirements of the region. There are two main reasons to this: (1) GB is a novice province, indeed yet to be declared as a constitutional province of Pakistan. It lacks governance experience at large despite that it has some the very dedicated and sincere politicians; and (2) GB lacks resources need to govern such a vast expanse of land. It is running on grants, aids and allocations from the centre with no worthwhile revenue generation within the region. It needs to be allocated the desired sum of financial resources or else turned into a constitutional province so that it can levy provincial taxes to make ~~the~~ both ends meet.

Economic Security

To ensure economic security in GB at all three levels – macro, meso and micro – it is imperative that the region must attain self-reliance to generate the needed revenue from within. The following are imperative: (1) GB should get its regular share from the federation based not only on the population but the expanse of territorial area and the level of socio-economic development; (2) The GB government should have constitutional powers to levy provincial taxes; (3) GB should be given royalty of the hydropower projects to be constructed in the region e.g. Diamer-Bhasha dam etc; (4) The revenue of tourism, mountaineering and mining etc should completely go to the provincial exchequer of GB; (5) Share of Sost Dry Port should be given to Gilgit-Baltistan (6) Formulae should be worked out for GB's share in CPEC in consultation with GB Government; and (6) At least two economic zones should be made in GB as part of CPEC.

Unexplored Potential

GB's economic potential has not been fully explored. The unexplored or less-explored areas include hydro-power potential, tourism, mountaineering and trekking, trade, agro-industry for preservation and value addition of fruits and vegetables, mining of gemstones and other minerals, timber trade and handicraft. This potential, even if half exploited, can work to boost the economy of the GB region manifold. A methodical approach is recommended for various ministries of GB to realize the economic potential by focussing on various areas separately.

Boosting Mountaineering and Trekking

A number of steps need to be initiated by the government to facilitate and thus boost mountaineering. A few are recommended as follows: (1) Ease visa policy; (2) Easing mountaineering routes (India has been greatly encouraging tourism in eastern Karakorum on the Indian side. Several international expeditions have been encouraging on the Indian side. Some of the great films have been shot there, such as film Meru, waiving off climbing permit, easing permit procedures); (3) Easing or relaxing climbing permit process; (4) Provision of invisible security; (5) Additional flights during peak season with minimized airfare; (6) Boosting hotel industry in GB; (7) Encouraging local cultural festivals in GB; (8) Encourage new sports; (9) One-window operation to complete the procedures, including security documentation, at Gilgit and Skardu for mountaineers and trekkers; (10) Private helicopter companies should be issued permits to operate in the region to facilitate mountaineers and trekkers; (11) Air safaris should be started; (12) A highly qualified team should be formed for search and rescue with all required equipment including helicopters.

Mineral Exploration and Excavation Policy of Gilgit-Baltistan

In accordance with the National Mineral Policy (NMP) 2013, minerals other than nuclear minerals are a provincial subject under the Constitution. Provincial Governments/federating units are responsible for regulation, detailed exploration and mineral development.³⁵⁷ In GB, the mining sector falls in the GB Council subjects. Whereas the GB government claims to have adopted the provisions of NMP, the NMP 2013 does not have even a passing reference of GB even though it does mention other parts and provinces including AJ&K and FATA. It is recommended that the GB governments should formulate a Mineral Exploration and Excavation Policy of Gilgit-Baltistan (MEEP), legislate it in GBLA and also get it approved in the GB Council. MEEP should work to totally ban illegal and unlicensed mining. Strict punishments should be promulgated for violators. The tax / licence fee should be levied to add to GB's revenue.

Connectivity Enhancement and Development of Communication Infrastructure

In order to serve the cause of human security, benefit from CPEC optimally and integrate the GB region fully with Pakistan, improvement, construction and opening of the following communication links to and from GB: (1) Improvement in keeping with international standards and where necessary realignment of KKH so as

³⁵⁷ "National Mineral Policy – 2013": 1.

to ensure that it really become all weather communication link and the mainstay of CPEC; (2) Building an international standard highway to link KKH and Abbottabad via Naran and Kaghan across the Babusar pass including the construction of a main tunnel to ensure that this link also becomes all weather; (3) Construction of highway from KKH to Khaplu via Skardu with major realignment where needed; (4) Construction of highway from Gilgit to Chitral via Gahkuch and Mastuj through Shandur Pass; (5) Construction of highway to link GB and AJ&K via Rattu and Kel through Shounter Pass with major tunnelling effort; (6) Construction and opening of Skardu-Kargil, Skardu-Batalik and Khaplu-Turtok routes. If all these routes are scientifically planned and constructed, GB can become one of the most developed mountainous regions in the world. Alongside, it is imperative to improve the air links. It is imperative to give opening to private airlines also. It is also vital to start all weather plane service to improve human security conditions in the region.

The GB region has great potential for the establishment of economic zones and industrial units. Agro-industry suits the region. The huge power generation potential of the region supports the industrial arrangements. Cheap supply of electricity and tax concessions can boost the industrial ventures. It is recommended that at least two economic zones should be set up, one each in Gilgit and Baltistan, as part of CPEC. This would work to bring the benefits of CPEC down to the level of the common man in the region.

Within GB, there is a dire need to connect all major valleys with the highways through metalled roads. GB's road network is full of suspension bridges, which often need repair. Even in fit condition, only a single vehicle can cross a suspension bridge at one time. Replacement of suspension bridges with RCC bridges is an urgent necessity.

Food Security

GB's cultivable land is fertile. The problem is with geography, climate, availability of land, and food security governance. A lot of barren land, otherwise cultivable, is not being farmed. Government oversight is recommended to bring the maximum possible land under cultivation to increase the yield of cereals in GB. Water lift schemes can help a great deal in boosting the agriculture in GB. This would work to improve both economic security and food security situation in the region. It is also recommended that instead of buying wheat from the Punjab or other provinces for subsidized provision in GB, wheat production in GB should be incentivized. This can

be done if the government purchases wheat from within GB at the rates of the Punjab and provides to the food department for further sale at a subsidized price to the people of GB. The farmers of GB would benefit but the government would also be able to save time, effort and finances spent on transportation of wheat from the Punjab to GB.

There is a great potential from the establishment of a number of food preservation units – at least one per district can be set up. This would facilitate the local fruit and vegetable growers and also work to create jobs. The government should also look for initiatives to increase the production of meat and milk and the creation of a food chain based on the preservation of these protein products. There is a great scope for growth in fisheries sector. Trout can prove to be a cash product if developed on scientific lines.

Fish should be given into community custody just like the wildlife such as markhor, ibex and blue sheep rather than keeping it to the small size of staff. A participatory conservation approach would certainly pay as is the case with other species e.g. ibex etc. The community should be given share from the sport fishing licence fee just like trophy hunting. The community must also be obliged to pay for fishing, if they want, but the fee must be half of those from any other area of GB or Pakistan. The good offices of organizations like the Pakistan game fish association (PGFA) may be used for the development and execution of the concept.

Health Security

Health security in GB is certainly affected by climate and geographic environment. However, health security governance aggravates it. There are two main issues: the availability and capacity of doctors and paramedical staff, and budgetary allocation. On the other hand, dispensary and small health units exist even in some of the remote valleys. It is recommended that budget allocation should be carried out both on the basis of population and remoteness. The distantly located valleys should get appropriate share of health budget to run the local dispensaries. It is of note that a number of medical students graduating from various medical colleges on quota of GB do not return to the region to serve the people. The government of GB should legislate that anyone studying on GB's quota must serve in the region at least for five years. This would initiate a healthy cycle, which would help resolve the issue of deficiency of doctors in the region. Correspondingly, the GB government should incentivize the service of doctors in GB by means of better remuneration and other facilities.

The GB government should concentrate on the improvement of district headquarters (DHQ) hospitals. If all ten DHQ hospitals are properly equipped, staffed and resourced, there is no reason for health security profile in GB not to improve. Besides, to benefit from the medicinal herbs available in GB, the establishment of a Herbal Medicine Research Institute (HMRI) in GB is recommended. Astore can be the potential location for such an enterprise with campuses at Skardu and Gilgit.

Personal Security

Personal security in any geographic region, including GB, is a function of the overall security system. On the whole, GB has the best law and order situation in Pakistan. In May 2016, there were 14 inmates in District Jail Skardu and none of them was charged for heinous crimes. The jail at Gilgit did have a few inmates with terror charges. This shows the state of law and order. However, sectarianism remains a living challenge for the region. Yet, it is considered that even the sectarian impulse gets fuel from outside. Likewise, the sectarian terrorists may also come from outside the region to perpetrate the acts of terror. Hence, compatible policing and other law enforcement measures are of utmost importance. Government must keep the religious scholars of all sects on board continually.

The internal security challenges are linked with CPEC, too. India has openly announced its opposition to this project of regional significance. It is feared that security threats may be exaggerated to create hurdles on the way to the establishment of CPEC. A division size force of Pakistan Army has already been raised for security of the corridor. Coordination between various departments and agencies is of the essence to ensure security of the corridor fittingly.

Community Security

As has been discussed earlier, GB is made up of various geographic, ethnic, linguistic and sectarian communities. Generally, all these communities of geographically distributed except for Gilgit, the capital city, wherein Sunni, Shia and Ismaili are living in good numbers. Community security in Gilgit takes a different shape wherein physical safety and protection of life and properties is imperative by means of law enforcement and efforts to induce inter-community harmony. In other areas, e.g. in distant geographic communities, this subset of human security needs a wholesome treatment. In most of valleys, there is no law and order problem, however, the communities need to be taken care of in terms of health, education, food,

environmental and economic security. Localized provision of services and facilities is recommended. Community engagement and participation would be of great value.

Environmental Security

By means of governance approaches and the use of modern technology, a lot of environmental security threats in GB can be saved from turning into disasters. To save from the hazards of GLOF, it is recommended that annual confirmatory survey should be carried out by Pakistan Meteorological Department (PMD). The people living in the risk zones e.g. in the torrents or valleys endangered by GLOF should be shifted to suitable nearby places.

The response to environmental security hazards needs to be institutionalized and strengthened. Rescue-1122 in various districts of GB is a passionate but not a potent force. The rescue workers have always been seen putting in greater efforts during rescue and relief efforts in calamity-hit events and areas. However, their response capacity in terms of resources is limited. It is recommended that Rescue-1122, in all districts, should be trained appropriately and resourced well so as to be able to respond to environmental threats effectively. Likewise, GB Disaster Management Authority (GBDMA) is a functional yet weak institution both at the level of the capital and districts. It does not have sufficient rescue, relief and rehabilitation resources and expertise. It should be strengthened and reinforced with sufficient relief supplies and technical equipment.

Landslides along the highways and roads in GB often disrupt and block the movement of traffic for days and weeks. The answer may be found in placing road clearance equipment and vehicles at appropriate intervals. This would certainly be even more crucial for keeping the KKH open when CPEC becomes operative.

Recommendations for Future Research

The role of geography in human security in Gilgit-Baltistan is an umbrella theme and a pioneer study on the subject, which can act as a basis for a number of topics for focused research. For future research on geo-humanism in GB, the following topics are recommended:

- Geo-humanism and political security in Gilgit-Baltistan.
- Geo-humanism and economic security in Gilgit-Baltistan.
- Geo-humanism and food security in Gilgit-Baltistan.

- Geo-humanism and health security in Gilgit-Baltistan.
- Geo-humanism and personal security in Gilgit-Baltistan.
- Geo-humanism and community security in Gilgit-Baltistan.
- Geo-humanism and environmental security in Gilgit-Baltistan.
- Geo-humanism and energy security in Gilgit-Baltistan.
- Geo-humanism and water security in Gilgit-Baltistan.
- Geo-humanism and womens' security in Gilgit-Baltistan.
- Geo-humanism and childrens' security in Gilgit-Baltistan.
- Geo-humanism and education security in Gilgit-Baltistan.

VALIDATION OF HYPOTHESIS

Geography has, without a doubt, a tremendous effect on the human security profile of a given geographic region. The empirical evidence from Gilgit-Baltistan substantiates a stronger and foundational role of geography in the human security profile of the region, and hence validates the hypothesis of this dissertation and the theoretical framework of geo-humanism in principle. It corroborates that *if geography is taken as the basis for development considering its role as an impediment and expedient, the human security situation in Gilgit-Baltistan can improve*. It also supports that good governance and appropriate use of modern technology can mitigate the negative effects of geography on human security.

The people of GB, who are enduring the rigours of geography and benefiting from its dividends, have virtually confirmed the hypothesis statement in their responses to the research questionnaire. Their views have been valuable in drawing workable conclusions so as to make recommendations for the improvement of human security profile of the region. The nearly 100 thematic but unstructured interviews and focus group discussions also supported the hypothesis.

EPILOGUE

The dissertation has thoroughly examined the impact of geography, both positive and negative, on the human security profile of the GB region. There are tremendous effects. It has also been seen that the mountainous environment works to shape the human security profile of a region more than other forms of geography. Thus, it is imperative to keep the geographic imperatives in the form of impediments and expedients in view in planning and execution of various projects.

The constitutional status of GB, communication inadequacies, small size of the economy and lack of opportunities actually point to governance inadequacies at the level of federation as well as GB region. To start with, the GB region needs to be given the status of a constitutional province of Pakistan in accordance with the wishes with the people. Economic freedom in the form of revenue generation and economic planning can mitigate a number of human security threats.

GB's geography needs to be utilized both in terms of location and makeup. If GB is connected with the adjoining regions as has been recommended, it would pave the way for a mutually beneficially relationship between all these regions both on an economic and cultural plane. CPEC can prove to be a game-changer not only for the rest of Pakistan but more so for GB as it is located at the head of the corridor in Pakistan. However, it is of significance to set up two economic zones in GB as has been recommended earlier to enhance economic opportunities for the people of the region. This would work a great deal towards a better human security profile of the region. The planning for other subsets of human security, especially food, health and environmental security is also required so that each geographic community is engaged appropriately and no community, however remote, is left out. In sum, human security and socio-economic development in GB can come about by utilizing geography, which must be taken into consideration in all human spheres and at all levels.

Annex A

LIST OF MOUNTAIN PEAKS IN PAKISTAN ABOVE 7,000 M AND 8,000 M

| Serial | Mountain Peak | World Ranking | Height (M) | Mountain Range | Location (District) | Map Type | Other Common Names |
|--------|----------------|---------------|------------|----------------|-------------------------|------------|--|
| 1. | K-2 | 2 | 8611 | Karakoram | Shigar district | 1: 250,000 | Karakoram - 2 / Chogori (Balti Language) / Godwin Austin / Savage Mountain |
| 2. | Nanga Parbat | 9 | 8126 | Himalayas | Diamer district | 1: 250,000 | Naked mountain (Kashmiri language)/ killer mountain / Deomir (mountain of gods) |
| 3. | Gasherbrum I | 11 | 8068 | Karakoram | Shigar district | 1:50,000 | K-5 / Hidden Peak / Beautiful Mountain (Balti Language) |
| 4. | Broad Peak | 12 | 8047 | Karakoram | Shigar district | 1:50,000 | K-3 (1.5 km long summit) / Falchan Kangri |
| 5. | Gasherbrum II | 13 | 8035 | Karakoram | Shigar district | 1:50,000 | K-4 |
| 6. | Gasherbrum III | - | 7952 | Karakoram | Shigar district | 1:200,000 | |
| 7. | Gasherbrum IV | 17 | 7920 | Karakoram | Shigar district | 1:50,000 | Shinning wall (highly visible west face of Gasherbrum IV) |
| 8. | Distaghil Sar | 19 | 7885 | Karakoram | Hunza / Nagar districts | 1: 250,000 | Highest mountain in Hispar Muztagh |
| 9. | Kunyang Chhish | 21 | 7852 | Karakoram | Hunza / Nagar districts | 1: 250,000 | Kunyang Kish / Khiangyang Kish |
| 10. | Masherbrum | 22 | 7821 | Karakoram | Shigar district | 1: 250,000 | K-1 / Queen of Peaks |
| 11. | Batura I | 25 | 7795 | Karakoram | Hunza / Nagar districts | 1: 250,000 | Highest Peak of Batura Muztagh |
| 12. | Rakaposhi | 27 | 7788 | Karakoram | Hunza / Nagar districts | 1: 250,000 | Dumani (<i>mother of mist</i>), with uninterrupted vertical rise of 6000 M from base to summit, Rakaposhi is the tallest mountain on earth in terms of relative height |
| 13. | Batura II | - | 7762 | Karakoram | Hunza / Nagar districts | 1: 250,000 | Hunza Kunji / Peak 31 |
| 14. | Kanjut Sar | 26 | 7760 | Karakoram | Hunza / Nagar | 1: 250,000 | Located in Hispar Muztagh |

| | | | | | | | |
|-----|------------------------|----|------|-----------|-------------------------|--------------|---|
| | | | | | districts | | |
| 15. | Saltoro Kangri | 31 | 7742 | Karakoram | Ghanche district | 1: 250,000 | Highest Peak of Saltoro Range |
| 16. | Batura III | 32 | 7729 | Karakoram | Hunza / Nagar districts | 1: 2,50000 | |
| 17. | Tirich Mir | 33 | 7708 | Hindukush | Chitral district | 1: 250,000 | King of Darkness (<i>Wakhi language</i>)/ Highest mountain of Hindukush & highest outside Himalayas and Karakoram |
| 18. | Chogolisa | 36 | 7665 | Karakoram | Shigar district | 1:50,000 | Bride peak (means wife of K-2 just opposite, a pretty couple) |
| 19. | Shispare | 38 | 7611 | Karakoram | Hunza / Nagar districts | 1: 250,000 | Shispare Sar |
| 20. | Silberzacken | - | 7597 | Himalaya | Diamer district | 1: 250,000 | East peak (<i>subsidiary peak of Nanga Parbat</i>) |
| 21. | Batura IV | - | 7594 | Karakoram | Hunza / Nagar districts | 1: 250,000 | |
| 22. | Trivor | 39 | 7577 | Karakoram | Hunza / Nagar districts | 1: 250,000 | |
| 23. | Skyang Kangri | 44 | 7545 | Karakoram | Shigar district | 1:200,000 | |
| 24. | Yukshin Gardan Sar | 55 | 7530 | Karakoram | Hunza / Nagar districts | 1:,00,000 | |
| 25. | Noshaq | 52 | 7492 | Hindukush | Chitral district | 1:1,000,000 | 2 nd highest in Hindukush / westernmost peak of world with height above 7,000 M |
| 26. | Pumari Chhish | 53 | 7492 | Karakoram | Hunza / Nagar districts | 1: 250,000 | |
| 27. | Trish Mir (North West) | | 7487 | Karakoram | | Tourist map | |
| 28. | Passu Sar | 54 | 7476 | Karakoram | Hunza / Nagar districts | 1:200,000 | |
| 29. | Teram Kangri I | | 7465 | Karakoram | | Tourist maps | Located in Indian-Occupied Areas |
| 30. | Malubiting | 58 | 7458 | Karakoram | Hunza / | 1: 250,000 | |

| | | | | | | | |
|-----|----------------------|----|------|-----------|-------------------------|--------------|--|
| | | | | | Nagar districts | | |
| 31. | Batura V | | 7453 | Karakoram | Hunza / Nagar districts | 1:200,000 | |
| 32. | Yazghil Dome | | 7440 | Karakoram | | Tourist maps | |
| 33. | K-12 | 61 | 7428 | Karakoram | | Tourist maps | Second Highest Peak in the Salto Mountains |
| 34. | Sia Kangri | 63 | 7422 | Karakoram | Shigar district | 1: 250,000 | Indira Col is 3 km to East |
| 35. | Haramosh | 67 | 7409 | Karakoram | Skardu district | 1: 250,000 | Peak 58 |
| 36. | Teram Kangri II | | 7406 | Karakoram | | Tourist maps | Located in Indian-Occupied Areas |
| 37. | Istor-o-Nal | 68 | 7403 | Karakoram | Chitral District | Tourist maps | 3rd highest mountain in the Hindukush |
| 38. | SKIL BRUM | 66 | 7402 | Karakoram | Shigar District | 1:50,0000 | |
| 39. | Ghent Kangri | 69 | 7400 | Karakoram | Ghanche district | 1: 250,000 | |
| 40. | Ultr Sar | 70 | 7388 | Karakoram | Hunza / Nagar districts | 1: 250,000 | |
| 41. | Teram Kangri III | | 7382 | Karakoram | | Tourist maps | Located in Indian-Occupied Areas |
| 42. | Sherpi Kangri | 74 | 7380 | Karakoram | Ghanche district | 1:200,000 | |
| 43. | Karun Koh | | 7350 | Karakoram | | Tourist maps | |
| 44. | Saraghrar | 78 | 7349 | Karakoram | | Tourist maps | |
| 45. | Momhil Sar | 64 | 7343 | Karakoram | Hunza district | 1: 250,000 | Parent Peak Trivor |
| 46. | Momhil Sar | | 7342 | Karakoram | Hunza district | 1: 250,000 | |
| 47. | Yutmo Sar | - | 7330 | Karakoram | Hunza district | 1:200,000 | |
| 48. | Bojohagur Duanasir I | - | 7329 | Karakoram | Hunza district | 1: 250,000 | |
| 49. | Yazghil | | 7324 | Karakoram | Hunza district | Tourist maps | |
| 50. | Gasherbrum V | - | 7321 | Karakoram | Shigar district | 1:50,000 | |
| 51. | Chongtar | 81 | 7315 | Karakoram | Shigar district | 1:200,000 | |
| 52. | Baltoro Kangri | | 7312 | Karakoram | Shigar district | 1:200,000 | Golden Throne |
| 53. | Ch (North II) | | 7300 | Karakoram | Shigar district | 1:200,000 | |
| 54. | Point-7300 | - | 7300 | Karakoram | Shigar district | 1:200,000 | |

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|-----|--------------------|-----|------|-----------|-------------------------|--------------|----------------------------------|
| 55. | Urdok Peak | | 7300 | Karakoram | | Tourist maps | |
| 56. | Teram Kangri IV | | 7300 | Karakoram | | Tourist maps | Located in Indian-Occupied Areas |
| 57. | Passu Diar | - | 7295 | Karakoram | Hunza / Nagar districts | 1: 250,000 | |
| 58. | Point-7295 | - | 7295 | Karakoram | | Tourist maps | |
| 59. | Malubiting | - | 7291 | Karakoram | Hunza / Nagar districts | 1:200,000 | |
| 60. | Shingelk Smoking | | 7291 | Hindukush | | Tourist maps | |
| 61. | Baintha Brak | 87 | 7285 | Karakoram | Shigar district | 1: 250,000 | |
| 62. | Passu Peak | | 7284 | Karakoram | Hunza district | Tourist maps | |
| 63. | Yutmaru Sar | 88 | 7283 | Karakoram | Skardu district | 1: 250,000 | |
| 64. | Baltistan Peak | 89 | 7282 | Karakoram | Ghanche district | 1:50,000 | K- 6 |
| 65. | Baltoro Kangri III | | 7280 | Karakoram | Shigar district | Tourist maps | |
| 66. | Muztagh Tower | 91 | 7276 | Karakoram | Shigar district | 1:200,000 | Ice Tower |
| 67. | Diran | 93 | 7266 | Karakoram | Nagar district | 1: 250,000 | |
| 68. | Summari Peak | | 7263 | Karakoram | | Tourist maps | |
| 69. | Rimo – III | 98 | 7233 | Karakoram | | Tourist maps | |
| 70. | Apsarasas Peak IV | | 7227 | Karakoram | | Tourist maps | |
| 71. | Darban Zom | | 7219 | Karakoram | | Tourist maps | |
| 72. | Malunguti Sar | 104 | 7207 | Karakoram | Hunza district | 1:200,000 | |
| 73. | Singhi Kangri | 108 | 7207 | Karakoram | Shigar district | 1:200,000 | Located in Indian-Occupied Areas |
| 74. | Mount Rose | | 7202 | Karakoram | | Tourist maps | |
| 75. | Lupghar Sar | 109 | 7200 | Karakoram | Hunza / Nagar districts | 1:200,000 | |
| 76. | Bularang Sar | | 7200 | Karakoram | Hunza / Nagar districts | 1:200,000 | |
| 77. | Point-7200 | | 7200 | Karakoram | Hunza / Nagar districts | 1:200,000 | |
| 78. | Summa (South) | | 7170 | Karakoram | | Tourist maps | |
| 79. | Karun Koh | - | 7164 | Karakoram | | Tourist maps | |
| 80. | Hachindar | - | 7163 | Karakoram | Hunza / | 1:200,000 | |

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|------|----------------------|---|------|-----------|-------------------------|--------------|----------------------------------|
| | Chhish | | | | Nagar districts | | |
| 81. | Snow Dome | - | 7160 | Karakoram | Shigar district | 1:50,000 | |
| 82. | Latok I | - | 7151 | Karakoram | Shigar district | 1: 250,000 | |
| 83. | Depak Peak | | 7150 | Karakoram | Ghanche district | 1:50,000 | Located in Indian-Occupied Areas |
| 84. | Latok II | - | 7145 | Karakoram | | Tourist maps | |
| 85. | Kampir Dior | - | 7143 | Karakoram | Hunza / Nagar districts | 1: 250,000 | |
| 86. | Point-7133 | - | 7133 | Karakoram | | Tourist maps | |
| 87. | Shakawar Peak | | 7125 | Hindukush | | Tourist maps | |
| 88. | Koh-i-Nedir Shah | | 7116 | Hindukush | | Tourist maps | |
| 89. | Kunyang Chhish -N | - | 7108 | Karakoram | Shigar district | 1:200,000 | |
| 90. | Udren Zom | - | 7108 | Karakoram | | Tourist map | |
| 91. | Sia Chhish | | 7100 | Karakoram | Skardu district | 1:200,000 | |
| 92. | Nangmah Peak | | 7100 | Karakoram | Skardu district | 1:200,000 | |
| 93. | Ghenta Peak | - | 7100 | Karakoram | Hunza / Nagar districts | 1:200,000 | |
| 94. | Yukshin Garden 2 | | 7100 | Karakoram | Hunza / Nagar districts | 1:200,000 | |
| 95. | Nobisam Zom | | 7070 | Hindukush | | Tourist maps | |
| 96. | Rakhiot Peak | - | 7070 | Himalaya | Diamer district | 1: 250,000 | Subsidiary Peak of Nanga Parbat |
| 97. | Pyramid / Thyor peak | | 7058 | Karakoram | | Tourist maps | |
| 98. | Sangemarmar Sar | - | 7050 | Karakoram | | Tourist maps | |
| 99. | Link Sar | - | 7041 | Karakoram | Ghanche district | 1:200,000 | |
| 100. | Spantik | - | 7027 | Karakoram | Hunza / Nagar districts | 1: 250,000 | Golden Peak |
| 101. | Akher Chhish | - | 7020 | Hindukush | | Tourist maps | |
| 102. | Pamiri Sar | - | 7016 | Karakoram | | Tourist maps | |
| 103. | Langer Peak | | 7016 | Hindukush | | Tourist maps | |
| 104. | Rakaposhi East | - | 7010 | Karakoram | Nagar district | 1: 250,000 | |
| 105. | Mohsin Mir | - | 7004 | Karakoram | | Tourist maps | |
| 106. | Gasherbrum | | 7003 | Karakoram | | Tourist | |

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|------|-------------------|--|------|-----------|-------------------------------|-----------------|--|
| | VI | | | | | maps | |
| 107. | Point-7000 | | 7000 | Karakoram | Hunza / Nagar districts | 1:200,000 | |
| 108. | Barpoo Burakha | | 7000 | Karakoram | | Tourist maps | |
| 109. | Kaberi Peak | | 7000 | Karakoram | | Tourist maps | |

Source: Sifted by the author from various maps to include 1:250,000, 1:200,000, 1:50,000, and tourist maps. Some of these peaks and their bases were personally visited and snapped by the author.

LIST OF LARGE GLACIERS IN GILGIT-BALTISTAN

| Serial | District | Glacier | Highest Adjoining Peaks | Height (M) | Remarks |
|--------|----------|--------------------|-------------------------|------------|--------------------------|
| 1. | Gilgit | Mani Glacier | Mani | 6685 | On district boundary |
| 2. | “ | Baska Glacier | Malubiting | 7458 | “ |
| 3. | “ | Phupurach Glacier | Phuparash | 6574 | “ |
| 4. | “ | Bulche Glacier | Miar | 6824 | “ |
| 5. | “ | Hinarchi Glacier | Diran | 7266 | “ |
| 6. | “ | Surgin Glacier | - | - | Within district boundary |
| 7. | “ | Kunti Glacier | - | - | “ |
| 8. | “ | Shani Glacier | - | - | “ |
| 9. | “ | Ishkapal Glacier | Sasi Syanry | 6100 | “ |
| 10. | Ghizer | Hayul Glacier | - | - | On district boundary |
| 11. | “ | Bay Gaz Glacier | - | - | “ |
| 12. | “ | Badswat | Swat Maras | 6300 | “ |
| 13. | “ | Borth Glacier | Kuti Dorkush | 5900 | “ |
| 14. | “ | S.K Glacier | Bori Dorkush | 6780 | “ |
| 15. | “ | W.K Glacier | - | - | Within district boundary |
| 16. | “ | Karumbar Glacier | - | - | On district boundary |
| 17. | “ | N.K Glacier | - | - | “ |
| 18. | “ | S.Kuz Yaz Glacier | - | - | “ |
| 19. | “ | Chilinji Glacier | - | - | “ |
| 20. | “ | E.Marung Glacier | - | - | Within district boundary |
| 21. | “ | W.Marung Glacier | - | - | “ |
| 22. | “ | Kerun Bar Glacier | - | - | “ |
| 23. | “ | Barun Bar Glacier | - | - | “ |
| 24. | “ | Aghost Bar Glacier | - | - | “ |
| 25. | “ | Ghalsapar Glacier | - | - | On district boundary |
| 26. | “ | Mushk Bar | - | - | Within |

| | | | | | |
|-----|----------|-------------------------------|------------------|------|--------------------------|
| | | Glacier | | | district boundary |
| 27. | Diamer | Jolhari Glacier | - | - | “ |
| 28. | “ | Aril Glacier | - | - | Within district boundary |
| 29. | “ | Loiba Glacier | - | - | “ |
| 30. | “ | Raikot Glacier | - | - | “ |
| 31. | “ | Buldar Glacier | - | - | “ |
| 32. | Astore | Toshain (Rupal) Glacier | Unnamed Peak | 6315 | On district boundary |
| 33. | “ | Bazhin Glacier | - | - | Near Dist Bdry |
| 34. | “ | Tarishing (Chungphar) Glacier | Unnamed Peak | 4656 | Within district boundary |
| 35. | Kharmang | - | - | - | - |
| 36. | Skardu | Kuliha Glacier | - | - | Within district boundary |
| 37. | “ | Tormik Glacier | - | - | “ |
| 38. | “ | E.Mani Glacier | - | - | |
| 39. | “ | Khotia Lungma Glacier | - | - | “ |
| 40. | “ | Sengegang | - | - | “ |
| 41. | Nagar | Khani Basa Glacier | Khanibasa Chishh | 6500 | On district boundary |
| 42. | “ | Hispar Glacier | - | - | “ |
| 43. | “ | Haigutum Glacier | - | - | “ |
| 44. | “ | E.Makrong Glacier | - | - | “ |
| 45. | “ | W.Makrong Glacier | - | - | “ |
| 46. | “ | Garumbar Glacier | - | - | “ |
| 47. | “ | N.E.Jutmary Glacier | Kanjutsar | 7760 | “ |
| 48. | “ | Jutmoro Glacier | - | - | “ |
| 49. | “ | W.Yutmaru Glacier | - | - | “ |
| 50. | “ | Pumari Chishh Glacier | - | - | Within district boundary |
| 51. | “ | Kunyong Glacier | Unnamed Peak | 7760 | “ |
| 52. | “ | Chariska (Trivor) Glacier | - | - | Near Dist Bdry |
| 53. | “ | S.Lupghar | - | - | “ |

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|-----|-------|-------------------------|--------------|------|--------------------------|
| | | Glacier | | | |
| 54. | “ | Sumayar Bar Glacier | - | - | On district boundary |
| 55. | “ | Miar Glacier | - | - | Near Dist Bdry |
| 56. | “ | Barpu Glacier | - | - | Within district boundary |
| 57. | “ | Bualtar (Kapel) Glacier | Bulchi | 6959 | On district boundary |
| 58. | “ | Silkiang Glacier | - | - | Within district boundary |
| 59. | “ | Minapin Glacier | - | - | Near Dist Bdry |
| 60. | “ | Pisan Glacier | - | - | Within district boundary |
| 61. | “ | Gulmit Glacier | - | - | “ |
| 62. | “ | Masot Glacier | - | - | “ |
| 63. | “ | Nilt Glacier | - | - | “ |
| 64. | “ | Shilling Bar Glacier | - | - | On district boundary |
| 65. | “ | E.Bar Glacier | - | - | Within district boundary |
| 66. | “ | Baltar Glacier | Batura III | 7729 | Near Dist Bdry |
| 67. | “ | Toltar Glacier | Munocho | 5500 | “ |
| 68. | “ | E.Kukuar Glacier | - | - | “ |
| 69. | “ | N.Kukuar Glacier | - | - | On district boundary |
| 70. | “ | W.Kukuar Glacier | - | - | “ |
| 71. | “ | Kukuar Glacier | - | - | Within district boundary |
| 72. | “ | Aldar Kush Glacier | - | - | “ |
| 73. | “ | Sat Marao Glacier | - | - | Near Dist Bdry |
| 74. | “ | Kerengi Glacier | - | - | Within district boundary |
| 75. | Hunza | Baraldu Glacier | Unnamed Peak | 6460 | Near Dist Bdry |
| 76. | “ | Skorga Glacier | “ | 6045 | Within district boundary |

| | | | | | |
|------|---|----------------------------|---------------|------|--------------------------|
| 77. | “ | Virjerab Glacier | “ | 6456 | Near Dist Bdry |
| 78. | “ | West i V Glacier | - | - | Within district boundary |
| 79. | “ | West ii V Glacier | Unnamed Peak | 6456 | “ |
| 80. | “ | Sikarwar Glacier | “ | 6300 | “ |
| 81. | “ | East Khurdopin Glacier | - | - | Near Dist Bdry |
| 82. | “ | Upper Khurdopin Glacier | Tahu Rutum | 6651 | “ |
| 83. | “ | Khurdopin Glacier | Unnamed Peak | 6000 | Within district boundary |
| 84. | “ | Yukshin Garden Glacier | “ | 6600 | “ |
| 85. | “ | West V Glacier | - | - | “ |
| 86. | “ | Yazghil Glacier | Pumari Chish | 7942 | Near Dist Bdry |
| 87. | “ | Mulungut Glacier | Malanguti Sar | 7000 | “ |
| 88. | “ | Monhil Glacier | Momhilsar | 7343 | “ |
| 89. | “ | Lupghar Glacier | Lupgarsar | 7343 | Within district boundary |
| 90. | “ | Avdegar Gur Glacier | - | - | “ |
| 91. | “ | Gulmit Glacier | - | - | “ |
| 92. | “ | Gulkin Glacier | - | - | “ |
| 93. | “ | Passu Glacier | Passu Peak | 7478 | “ |
| 94. | “ | Shispare Hasanabad Glacier | Shispare Sdr | 7611 | “ |
| 95. | “ | Muchuhar Glacier | Batura Peak V | 7531 | “ |
| 96. | “ | Batura Glacier | Pamri Sar | 7016 | “ |
| 97. | “ | Rupur Glacier | - | - | “ |
| 98. | “ | Kuki Jerab Glacier | Kuksar | 6943 | “ |
| 99. | “ | E.Y.Y Glacier | - | - | Near Dist Bdry |
| 100. | “ | W.Y.Y Glacier | - | - | “ |
| 101. | “ | Yashkuk Yaz Glacier | - | - | “ |
| 102. | “ | Koz Yaz Glacier | - | - | “ |
| 103. | “ | Gulkawaja Glacier | - | - | Within district boundary |

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|------|--------|----------------------------|---------------------|------|--------------------------|
| 104. | “ | Parpik Glacier | - | - | “ |
| 105. | “ | N. Oprang Glacier | - | - | Near Dist Bdry |
| 106. | “ | W.O. Glacier | - | - | Within district boundary |
| 107. | “ | S.W.O. Glacier | - | - | “ |
| 108. | “ | S.Oprang Glacier | Unnamed Peak | 6400 | “ |
| 109. | “ | Shujerab Glacier | “ | “ | “ |
| 110. | “ | Shahim-i-Dur Glacier | “ | 6350 | Near Dist Bdry |
| 111. | Shigar | Namur Gans Glacier | - | - | “ |
| 112. | “ | W.Namur Glacier | Paljas | 5022 | “ |
| 113. | “ | Senchu Gans | - | - | Within district boundary |
| 114. | “ | Remenaok Glacier | Rangkushkun Glacier | 5357 | Near Dist Bdry |
| 115. | “ | E.Marpho Glacier | - | - | Within district boundary |
| 116. | “ | W.Marpho Glacier | - | - | Near Dist Bdry |
| 117. | “ | Second E. Haramosh Glacier | Unnamed Peak | 6322 | “ |
| 118. | “ | Haramosh Glacier | “ | 6666 | “ |
| 119. | “ | Chogo Lungma Glacier | - | - | “ |
| 120. | “ | Basin Glacier | - | - | “ |
| 121. | “ | Morine Glacier | Gandes Chish | 6348 | “ |
| 122. | “ | Sagari Byen Glacier | Makrong Chish | 6607 | “ |
| 123. | “ | Bolocho Glacier | - | - | “ |
| 124. | “ | Kilwuri Gans | - | - | Within district boundary |
| 125. | “ | Kero Lungma Glacier | - | - | Near Dist Bdry |
| 126. | “ | Hucho Aichori Glacier | - | - | “ |
| 127. | “ | Solu Glacier | - | - | “ |
| 128. | “ | Sokha Glacier | - | - | Within district boundary |

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|------|---|-------------------------|--------------|------|--------------------------|
| 129. | “ | Ho Glacier | - | - | “ |
| 130. | “ | Tsilbu Glacier | - | - | “ |
| 131. | “ | Sosbun Glacier | Sosbun Brakk | 6413 | “ |
| 132. | “ | Tongo Glacier | | | “ |
| 133. | “ | Sokha Lumbu Glacier | Unnamed Peak | 5090 | “ |
| 134. | “ | Mango Glacier | - | - | “ |
| 135. | “ | Ghur Glacier | Unnamed Peak | 5794 | “ |
| 136. | “ | Biafo Glacier | Unnamed Peak | 5989 | “ |
| 137. | “ | Tahu Rutum Glacier | Tahu Rutum | 6651 | Near Dist Bdry |
| 138. | “ | Sim Glacier | Unnamed Peak | 6600 | “ |
| 139. | “ | Urzon Glacier | - | - | Within district boundary |
| 140. | “ | Baintha Glacier | Baintha | 5300 | “ |
| 141. | “ | Pharusang Glacier | - | - | “ |
| 142. | “ | Pakori Glacier | Koser Gunge | 6401 | “ |
| 143. | “ | Hoto Glacier | - | - | “ |
| 144. | “ | Sokpa Lungma Glacier | - | - | “ |
| 145. | “ | Mang Lungma Glacier | Mango Gusor | 6288 | “ |
| 146. | “ | E.Chingkong Glacier | - | - | “ |
| 147. | “ | S.Chingkong Glacier | - | - | On district boundary |
| 148. | “ | W.Chingkong Glacier | - | - | Within district boundary |
| 149. | “ | S.Choricho Glacier | Choricho | 6756 | “ |
| 150. | “ | N.Choricho Glacier | - | - | “ |
| 151. | “ | Borum Glacier | - | - | “ |
| 152. | “ | Surgus Glacier | - | - | “ |
| 153. | “ | Tsa Gang Glacier | - | - | “ |
| 154. | “ | Bulagang Glacier | - | - | “ |
| 155. | “ | Choktoi Glacier | Latokt IV | 6456 | “ |
| 156. | “ | Dumulter Gans Glacier | - | - | “ |
| 157. | “ | Nabandi Sobendi Glacier | - | - | “ |
| 158. | “ | Panmah Glacier | - | - | “ |
| 159. | “ | Drenmang | Skamri Peak | 6745 | On district |

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|------|---|-----------------------|--------------|------|--------------------------|
| | | Glacier | | | boundary |
| 160. | “ | Feroli Glacier i | - | - | Within district boundary |
| 161. | “ | Feroli Glacier ii | - | - | “ |
| 162. | “ | S.Chiring Glacier | Unnamed Peak | 6100 | “ |
| 163. | “ | Chiring Glacier | Nera | 6340 | On district boundary |
| 164. | “ | Baltoro Glacier | Mitre | 6025 | Within district boundary |
| 165. | “ | Upper Baltoro Glacier | Snow Dome | 7150 | On district boundary |
| 166. | “ | Liligo Glacier | - | - | “ |
| 167. | “ | Mandu Glacier | - | - | “ |
| 168. | “ | Yarmanendu Glacier | - | - | “ |
| 169. | “ | Biarchedi Glacier | Unnamed Peak | 6674 | “ |
| 170. | “ | Nuating Glacier | - | - | Within district boundary |
| 171. | “ | Vigne Glacier | Unnamed Peak | 6716 | Near Dist Bdry |
| 172. | “ | Abrozi Glacier | - | - | “ |
| 173. | “ | Gasherbrum Glacier | - | - | On district boundary |
| 174. | “ | W.G Glacier | - | - | Within district boundary |
| 175. | “ | Broad Peak Glacier | - | - | “ |
| 176. | “ | Khal-Khal Glacier | - | - | “ |
| 177. | “ | Praqpa Glacier | Praqpa ri | 7089 | “ |
| 178. | “ | Savoia Glacier | - | - | Near District Boundary |
| 179. | “ | Godwin Austin Glacier | - | - | “ |
| 180. | “ | Young Husband Glacier | - | - | “ |
| 181. | “ | Biange Glacier | - | - | Within district boundary |
| 182. | “ | Lungka Glacier | - | - | “ |
| 183. | “ | Chagaran Glacier | - | - | Near District Boundary |
| 184. | “ | Muztagh Glacier | - | - | “ |

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|------|---------|----------------------------|------------------|------|--------------------------|
| 185. | “ | Biali Glacier | Biali | 6729 | Within district boundary |
| 186. | “ | Dunge Glacier | - | - | Near District Boundary |
| 187. | “ | Trango Glacier | Trango Tower III | 6286 | “ |
| 188. | “ | Uli Biaho Glacier | Uli Biaho | 6417 | Within district boundary |
| 189. | “ | N.Hainablak Glacier | - | - | “ |
| 190. | “ | S.Hainablak Glacier | - | - | “ |
| 191. | Ghanche | Chulung Glacier | - | - | On district boundary |
| 192. | “ | Gyang Glacier | - | - | “ |
| 193. | “ | Milzakaphal Glacier | - | - | “ |
| 194. | “ | Chumik Glacier | - | - | Within district boundary |
| 195. | “ | Grahmalumba Glacier | Unnamed Peak | 7200 | Near district boundary |
| 196. | “ | Ali Brangsa Glacier | - | - | Near district boundary |
| 197. | “ | Bilafond (Saltoro) Glacier | - | - | “ |
| 198. | “ | Naram Glacier | - | - | Within district boundary |
| 199. | “ | Dong Dong Glacier | Dong Dong | 6250 | “ |
| 200. | “ | Sherpi Gung Glacier | Sherpi Kangri | 5297 | “ |
| 201. | “ | N.Sherpi Glacier | - | - | “ |
| 202. | “ | Kondus Glacier | Unnamed Peak | 6750 | “ |
| 203. | “ | Silver Thorn Glacier | - | - | “ |
| 204. | “ | Hordinge Glacier | Mt Hardinge | 7093 | On district boundary |
| 205. | “ | Kaberi Glacier | - | - | On district boundary |
| 206. | “ | W.Kaberi Glacier | - | - | Within district boundary |
| 207. | “ | Batowaho Glacier | - | - | “ |

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| 208. | “ | Lachhit Glacier | - | - | “ |
| 209. | “ | Nangmah Glacier | - | - | “ |
| 210. | “ | Tsarak Tsa Glacier | Unnamed Peak | 6325 | “ |
| 211. | “ | Chubuger Dakusa Vestu Glacier | “ | 6700 | “ |
| 212. | “ | Chogolisa Glacier | - | - | Near district boundary |
| 213. | “ | Gondogoro Glacier | - | - | “ |
| 214. | “ | Serac Glacier | - | - | Within district boundary |
| 215. | “ | Masherbrum Glacier | - | - | “ |
| 216. | “ | Aling Glacier | Unnamed Peak | 6400 | “ |
| 217. | “ | Honboro Glacier | Honboro | 6459 | “ |
| 218. | “ | Upper Thalley Glacier | - | - | “ |
| 219. | “ | Kande Glacier | - | - | “ |
| 220. | Indian-Occupied Siachen area | La Yongma Glacier | - | - | Part of Siachen Conflict |
| 221. | “ | Rayong Glacier | - | - | “ |
| 222. | “ | Dzingrulma Glacier | - | - | “ |
| 223. | “ | N.Hasrhat Glacier | - | - | “ |
| 224. | “ | S.Hasrhat Glacier | - | - | “ |
| 225. | “ | K-12 (Golf – II) Glacier | K -12 | 7100 | “ |
| 226. | “ | Lolofond Glacier | Tawiz | 6400 | “ |
| 227. | “ | Peak 36 Glacier | - | - | “ |
| 228. | “ | Ghent Glacier | Mt Ghent | 7401 | “ |
| 229. | “ | W. Source Glacier | - | - | “ |
| 230. | “ | E. Source Glacier | - | - | “ |
| 231. | “ | Siachen Glacier | Unnamed Peak | 6151 | “ |
| 232. | “ | Inner Teram Glacier | Teram Kangri | 7382 | “ |
| 233. | “ | Apsarasas Glacier | - | - | “ |
| 234. | “ | Teram Shehr Glacier | Mt Lakshmi | 6983 | “ |

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| 235. | “ | Upper Rimo Glacier | Unnamed Peak | 7226 | “ |
| 236. | “ | N. Rimo Glacier | - | - | “ |
| 237. | “ | Central Rimo Glacier | Rimo II | 7233 | “ |
| 238. | “ | Teram Shehr Ice Cap Glacier | Unnamed Peak | 6578 | “ |
| 239. | “ | S. Rimo Glacier | Rimo I | 7385 | “ |
| 240. | “ | N. Terong Glacier | Doab | 6045 | “ |
| 241. | “ | S. Terong Glacier | - | - | “ |
| 242. | “ | Shetkar Chorten Glacier | Chorien | 6050 | “ |

LIST OF PASSES IN GILGIT-BALTISTAN

| Serial | District | Pass | Height (M) | Connects | District |
|--------|----------|----------------------------|---------------|--|----------|
| 1. | Ghizer | Bashkaro An | 4,924 | Connects District Ghizer with District Swat | Ghizer |
| 2. | “ | Dadarili Pass | 5,030 | Connects District Ghizer with District Chitral | “ |
| 3. | “ | Kheli Gali | - | Connects District Ghizer with District Kohistan | “ |
| 4. | “ | Shandur Pass | 3,734 / 3,800 | Connects District Ghizer with District Chitral | “ |
| 5. | “ | Harchin An | - | Connects District Ghizer with District Chitral | “ |
| 6. | “ | Chumarkhan An | 4,328 | Connects District Ghizer with District Chitral | “ |
| 7. | “ | Zagaro An | 4,920 | Connects District Ghizer with District Chitral | “ |
| 8. | “ | Thui An | 4,500 / 4,499 | Connects District Ghizer with District Chitral | “ |
| 9. | “ | Darkut Pass | 4,650 / 4,744 | Connects District Ghizer with District Chitral | “ |
| 10. | “ | Karumbar An | 4343 / 4320 | Connects District Ghizer with District Chitral | “ |
| 11. | “ | Xik Uween (Qalandar Uween) | 4600 | Connects District Ghizer with Afghanistan (Wakhan) | “ |
| 12. | “ | Khora Bhurt | 4630 | Connects District Ghizer with Afghanistan (Wakhan) | “ |
| 13. | “ | Qalandar Uween | 4600 | Connects District Ghizer with District Hunza | “ |
| 14. | “ | Chilinji Pass | 5160 | Connects District Ghizer with District Hunza | “ |
| 15. | “ | Pakora (Naltar) Pass | 4710 | Connects District Ghizer with District Glt | “ |
| 16. | “ | Unnamed | - | Connects District Ghizer with District Glt | “ |
| 17. | “ | Unnamed | - | Connects District Ghizer with District Diamer | “ |
| 18. | “ | Batakhun Gali | - | Connects District Ghizer with District Diamer | “ |
| 19. | “ | Zhahai Gali | 4302 | Connects District Ghizer with District Diamer | “ |
| 20. | “ | Sochhi Gali | 4327 | Connects District Ghizer with District Diamer | “ |
| 21. | “ | Chileli Gali | 4237 | Connects District Ghizer with District Diamer | “ |
| 22. | “ | Unnamed | - | Connects District Ghizer | “ |

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| | | | | with District Diامر | |
| 23. | “ | Sheobat Gali | 4325 | Connects District Ghizer with District Diامر | “ |
| 24. | “ | Shahgichi Gali | 4304 | Connects District Ghizer with District Diامر | “ |
| 25. | “ | Cupher Gali | 4297 | Connects District Ghizer with District Diامر | “ |
| 26. | “ | Gupis Gali | 4572 | Within District | “ |
| 27. | “ | Raushan Gali | 4478 | “ | “ |
| 28. | “ | Gulmuti Gali | 4594 | “ | “ |
| 29. | “ | Singul Gali | - | “ | “ |
| 30. | “ | Nazbar An | 4980 | “ | “ |
| 31. | “ | Darmudar Hagher | 4495 | “ | “ |
| 32. | “ | Sachoi An | - | “ | “ |
| 33. | “ | Atar Pass | - | “ | “ |
| 34. | “ | Punji Pass | 4680 | “ | “ |
| 35. | “ | Asumbar An | 4560 | “ | “ |
| 36. | Diامر | Unnamed | - | Connects District Diامر with District Kohistan | Diامر |
| 37. | “ | Guper Gali | - | Connects District Diامر with District Kohistan | “ |
| 38. | “ | Sharili Gali | - | Connects District Diامر with District Kohistan | “ |
| 39. | “ | Jumagah Gali | - | Connects District Diامر with District Kohistan | “ |
| 40. | “ | Pushkari Gali | - | Connects District Diامر with District Kohistan | “ |
| 41. | “ | Kuba Gali | 4456 | Connects District Diامر with District Kohistan | “ |
| 42. | “ | Ghutrmun Gali | - | Connects District Diامر with District Kohistan | “ |
| 43. | “ | Shikaru Gali | - | Connects District Diامر with District Kohistan | “ |
| 44. | “ | Basoi Gali | - | Connects District Diامر with District Kohistan | “ |
| 45. | “ | Sagagar | - | Connects District Diامر with District Kohistan | “ |
| 46. | “ | Keogah Gali | - | Connects District | “ |

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| | | | | Diamer with District Kohistan | |
| 47. | “ | Butogah Gali | 4602 | Connects District Diamer with District Kohistan | “ |
| 48. | “ | Katai Gali | - | Connects District Diamer with District Kohistan | “ |
| 49. | “ | Babusar Pass | 4663 | Connects District Diamer with District Mansehra | “ |
| 50. | “ | Unnamed | - | Connects District Diamer with District Mansehra | “ |
| 51. | “ | Biah Gali | - | Connects District Diamer with District Mansehra | “ |
| 52. | “ | Barai Gali | 4325 | Connects District Diamer with District Mansehra | “ |
| 53. | “ | Unnamed | - | Connects District Diamer with District Mansehra | “ |
| 54. | “ | Unnamed | - | Connects District Diamer with District Mansehra | “ |
| 55. | “ | Toshing Gali | 5127 | Connects District Diamer with District Astore | “ |
| 56. | “ | Mazeno Pass | 5399 | Connects District Diamer with District Astore | “ |
| 57. | “ | Luthi Gali | - | Connects District Diamer with District Glt | “ |
| 58. | “ | Mater Gali | - | Connects District Diamer with District Glt | “ |
| 59. | “ | Gor Gali | - | Connects District Diamer with District Glt | “ |
| 60. | “ | Mitri Gali | - | Connects District Diamer with District Glt | “ |
| 61. | “ | Malpat Gali | - | Connects District Diamer with District Glt | “ |
| 62. | “ | Hurpui Gali | - | Connects District Diamer with District Glt | “ |
| 63. | “ | Bariban Gali | - | Connects District Diamer with District Glt | “ |
| 64. | “ | Shinhai Gali | 4595 | Connects District Diamer with District Glt | “ |
| 65. | “ | Chileli Gali | 4395 | Connects District | “ |

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| | | | | Diamer with District Glt | |
| 66. | “ | Kali Gali | - | Connects District Diamer with District Glt | “ |
| 67. | “ | Baregah Gali | 4560 | Within District | |
| 68. | “ | Biali Gali | - | “ | “ |
| 69. | “ | Unnamed | - | “ | “ |
| 70. | “ | Bosh Gali | - | “ | “ |
| 71. | “ | Khustu | 4837 | “ | “ |
| 72. | “ | Kut Gali | 3100 | “ | “ |
| 73. | Gilgit | Haramosh Pass | 4800 | Connects District Glt with District Skd | Gilgit |
| 74. | “ | Hurpai Gali | - | Within District | “ |
| 75. | “ | Pahot Gali | - | “ | “ |
| 76. | “ | Napur Gali | - | “ | “ |
| 77. | “ | Khomar Gali | - | “ | “ |
| 78. | “ | Jigi Gali | - | “ | “ |
| 79. | “ | Rakhan Gali | 4548 | “ | “ |
| 80. | “ | Batkor Gali | - | “ | “ |
| 81. | Nagar | Polan La | - | Connects District Nagir with District Shigar | Nagar |
| 82. | “ | Nushik Pass | - | Connects District Nagir with District Shigar | “ |
| 83. | “ | Hispar Pass | 5151 | Connects District Nagir with District Shigar | “ |
| 84. | “ | Daintar Pass | 4500 | Within District | “ |
| 85. | Kharmang | Katichu La | 4588 | Connects District Kharmang with District Skd | Deosai Plateau |
| 86. | “ | Shatung La | - | Connects District Kharmang with District Skd | Deosai Plateau |
| 87. | Astore | Unnamed | - | Connects District Astore with District Neelum | Astore |
| 88. | “ | Shuntar Pass | - | Connects District Astore with District Neelum | “ |
| 89. | “ | Fulway Pass | - | Connects District Astore with District Neelum | “ |
| 90. | “ | Unnamed | - | Connects District Astore with District Neelum | “ |
| 91. | “ | Dichil Gali | - | Connects District Astore with District Skd | “ |
| 92. | “ | Burzil Pass | 4198 | Within District | “ |
| 93. | “ | Kamri Pass | 4073 | “ | “ |
| 94. | “ | 5701 | - | “ | “ |
| 95. | “ | 4161 | - | “ | “ |
| 96. | “ | 4289 | - | “ | “ |
| 97. | “ | 4531 | - | “ | “ |
| 98. | Skardu | Karobal Gali | 4160 | Connects District Skd with IOK | Skardu |

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| 99. | “ | Marpo La | - | Connects District Skd with IOK | “ |
| 100. | “ | Unnamed | - | Connects District Skd with IOK | “ |
| 101. | “ | Ganto La | - | Connects District Skd with District Shigar | “ |
| 102. | “ | Banak Pass | 4964 | Connects District Skd with District Astore | “ |
| 103. | “ | Alam Pi (Alam Pir Pass) | 5030 | Connects District Skd with District Astore | “ |
| 104. | “ | Chachur Pass | 4266 | Connects District Skd with District Astore | Deosai Plateau |
| 105. | “ | Unnamed | - | Connects District Skd with District Astore | Deosai Plateau |
| 106. | “ | Stak La | 4570 | Within District | Skardu |
| 107. | “ | Dari La | 4724 | “ | “ |
| 108. | “ | Burji La | 4816 | “ | “ |
| 109. | “ | Taituh La | - | “ | Deosai Plateau |
| 110. | “ | Bari La | - | “ | Deosai Plateau |
| 111. | Shigar | Khurdopin La | 5790 | Connects District Shigar with District Hunza | Shigar |
| 112. | “ | Lukpe La | 6029 | Connects District Shigar with District Hunza | “ |
| 113. | “ | W.Muztagh | 5370 | Connects District Shigar with China (Xinjiang province) | “ |
| 114. | “ | Sarpolago | 5645 | Connects District Shigar with China (Xinjiang province) | “ |
| 115. | “ | E.Muztagh | 5422 | Connects District Shigar with China (Xinjiang province) | “ |
| 116. | “ | Savoia | 6250 | Connects District Shigar with China (Xinjiang province) | “ |
| 117. | “ | Skyang La (Windy Gap) | 6150 | Connects District Shigar with China (Xinjiang province) | “ |
| 118. | “ | Sela Pass | - | Connects District Shigar with China (Xinjiang province) | “ |
| 119. | “ | Conway Sd. | 5973 | Connects District Shigar with China (Xinjiang province) | “ |
| 120. | “ | Kondus Sd. | 6470 | Connects District Shigar with China (Xinjiang province) | “ |

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| 121. | “ | Sokoro La | 5073 | Within District | “ |
| 122. | “ | Sokha La | - | “ | “ |
| 123. | “ | Skam La | 5407 | “ | “ |
| 124. | “ | Sim La | 5833 | “ | “ |
| 125. | Ghangche | Gondogoro La | 5940 | Connects District Ghangche with District Shigar | Ghangche |
| 126. | “ | Masherbrum La | 5364 | Connects District Ghangche with District Shigar | “ |
| 127. | “ | Tiserpo La | 5084 | Connects District Ghangche with District Shigar | “ |
| 128. | “ | Thalley La | 4572 | Connects District Ghangche with District Shigar | “ |
| 129. | “ | Sia La | 5700 | Connects District Ghangche with IOK (Siachin Glacier) | “ |
| 130. | “ | Keris La | - | Within District | “ |
| 131. | “ | Sherpi La | 5700 | Connects District Ghangche with IOK (Siachin Glacier) | “ |
| 132. | “ | Bilafond (Saltoro) Pass | 5547 | Connects District Ghangche with IOK (Siachin Glacier) | “ |
| 133. | “ | Gyong La | 5700 / 5500 | Connects District Ghangche with IOK (Siachin Glacier) | “ |
| 134. | “ | Chulung La | 5580 | Connects District Ghangche with IOK (Siachin Glacier) | “ |
| 135. | “ | Chorbat La | 5090 | Connects District Ghangche with IOK (District Ladakh) | “ |
| 136. | “ | Irshad Uween | 4925 | Connects District Hunza with Wakhan (Afganistan) | “ |
| 137. | “ | Hapuchan Pass | - | Connects District Hunza with Wakhan (Afganistan) | “ |
| 138. | “ | Kilik Pass | 4827 | Connects District Hunza with Xinjiang province (China) | “ |
| 139. | “ | Mintika Pass | 4726 | Connects District Hunza with Xinjiang province (China) | “ |
| 140. | “ | Karchanai Dawan | - | Connects District Hunza with Xinjiang province | “ |

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| | | | | (China) | |
| 141. | “ | Parpik Dawan | | Connects District Hunza with Xinjiang province (China) | “ |
| 142. | “ | Khunjerab Pass | 4934 (4703) | Connects District Hunza with Xinjiang province (China) | “ |
| 143. | “ | Oprang Pass | - | Connects District Hunza with Xinjiang province (China) | “ |
| 144. | “ | Lupgar Pir Pass | 5190 | Within District | “ |
| 145. | “ | Werthum Pass | 5147 | “ | “ |
| 146. | “ | Unnamed | - | “ | “ |
| 147. | “ | Chafchingol Pass | 5100 | “ | “ |
| 148. | “ | Boisum Pass | 4875 | “ | “ |
| 149. | “ | Unnamed | - | “ | “ |
| 150. | “ | Shpodeen | 5346 | | |
| 151. | “ | Unnamed | - | “ | “ |
| 152. | “ | Maidur Pass | 5700 | “ | “ |
| 153. | “ | Shimshal Pass | 4735 | “ | “ |
| 154. | IOK | Rayang La | - | Within IOK | Siachin Conflict |
| 155. | “ | Shelkar Col | - | “ | “ |
| 156. | “ | Terong Pass | 5720 | “ | “ |
| 157. | “ | Italian Pass | 6096 | “ | “ |
| 158. | “ | Staghar Pass | - | “ | “ |
| 159. | “ | Turkistan La | 5855 | “ | “ |

Source: Sifted by the author from various maps, especially 1:250,000 and tourist maps. Some of these passes were physically visited and snapped by the author.

LIST OF LARGE RIVERS IN GILGIT-BALTISTAN

| Serial | District | Name of River |
|---------------|-----------------|--------------------------------|
| 1. | Ghizer | Karambar River |
| 2. | “ | Ishkoman River |
| 3. | “ | Yasin River |
| 4. | “ | Phandar River |
| 5. | “ | Ghizer River |
| 6. | Gilgit | Gilgit River |
| 7. | Hunza | Khunjerab River |
| 8. | “ | Mintika River |
| 9. | “ | Kilik River |
| 10. | “ | Ghojerab River |
| 11. | “ | Shimshal River |
| 12. | “ | Pamiritang River |
| 13. | “ | Hunza River |
| 14. | “ | Lupgar River |
| 15. | Nagar | Nagar River |
| 16. | “ | Daintar River |
| 17. | Diamer | Darel River |
| 18. | “ | Tangir River |
| 19. | Astore | Astore River |
| 20. | | Rattu River |
| 21. | | Kala Pani (Deosai Plains) |
| 22. | | Burzil River |
| 23. | Kharmang | Shingo River |
| 24. | “ | Indus River |
| 25. | Skardu | Tormik River |
| 26. | “ | Barra Pani (Deosai Plains) |
| 27. | “ | Shahtung River (Deosai Plains) |
| 28. | “ | Chhota Pani (Deosai Plains) |
| 29. | Shigar | Shigar River |
| 30. | “ | Basha River |
| 31. | “ | Braldu River |
| 32. | “ | Damurdo River |
| 33. | “ | Ching Kang River |
| 34. | Ghanche | Thalay River |
| 35. | “ | Saltoro River |
| 36. | “ | Shyok River |
| 37. | “ | Kundus River |
| 38. | “ | Dumsum River |
| 39. | “ | Hushe River |

LIST OF SMALL RIVER AND TORRENTS IN GILGIT-BALTISTAN

| Serial | District | Name of Small River / Torrent | Remarks |
|--------|----------|-------------------------------|---------|
| 1. | Ghizer | Ghutbar Gol | |
| 2. | “ | Chumarkhan Gol | |
| 3. | “ | Masholan Gol | |
| 4. | “ | Khan Bar Gol | |
| 5. | “ | Shukar Gah | |
| 6. | “ | Zhojat Gol | |
| 7. | “ | Khater Gol | |
| 8. | “ | Khokush Gol | |
| 9. | “ | Shawarang Gol | |
| 10. | “ | Sarbalo Gol | |
| 11. | “ | Bala Gol | |
| 12. | “ | Nicha Gol | |
| 13. | “ | Sarbalo Gol | |
| 14. | “ | Shashi Nalah | |
| 15. | “ | Reni Gah | |
| 16. | “ | Nicha Gol | |
| 17. | “ | Ano Gol | |
| 18. | “ | Shilober Gah | |
| 19. | “ | Bashkar Gah | |
| 20. | “ | Shagichai Gol | |
| 21. | “ | Sosat Nalah | |
| 22. | “ | Sayo Nalah | |
| 23. | “ | Khokush Gol | |
| 24. | “ | Baro Gah | |
| 25. | “ | Bathrate Nalah (Balti) | |
| 26. | “ | Hangrus Gah | |
| 27. | “ | Bulibalish Bar | |
| 28. | “ | Kano Gol | |
| 29. | “ | Barseter Bar | |
| 30. | “ | Bindro Gah | |
| 31. | “ | Manich Gah | |
| 32. | “ | Hilter Gah | |
| 33. | “ | Hundur Bar | |
| 34. | “ | Garmash Bar | |
| 35. | “ | Qurkokolti Bar | |
| 36. | “ | Bajgaz Gol | |
| 37. | “ | Balibaro Gah | |
| 38. | “ | Birgal Gah | |
| 39. | “ | Mungal Gah | |
| 40. | “ | Sher Gah | |
| 41. | “ | Gilamuch Gah | |

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| 42. | “ | Bichhar Gah | |
| 43. | “ | Raushan Gah | |
| 44. | “ | Chileli Gah | |
| 45. | “ | Doba Gah | |
| 46. | “ | Mashado Gah | |
| 47. | “ | Shan Gah | |
| 48. | “ | Kurgiza Gah | |
| 49. | “ | Shatucho Gah | |
| 50. | “ | Ano Gol | |
| 51. | “ | Sar Gah | |
| 52. | “ | Gupis Gah | |
| 53. | “ | Hakis Gah | |
| 54. | “ | Saro Gah | |
| 55. | “ | Gulapur Gah | |
| 56. | “ | Bahustar Nalah | |
| 57. | “ | Kanu Gol | |
| 58. | “ | Yalter Bar | |
| 59. | “ | Nazbar Nalah | |
| 60. | “ | Khamit Bar | |
| 61. | “ | Kha Bar | |
| 62. | “ | Muhan Bulang Bar | |
| 63. | “ | Naranal Bar | |
| 64. | “ | Darmodar Gah | |
| 65. | “ | Dahimal Gol | |
| 66. | “ | Gulmuti Gah | |
| 67. | “ | Thui Nalah | |
| 68. | “ | Das Bar | |
| 69. | “ | Shukar Gah | |
| 70. | “ | Mund Gah | |
| 71. | “ | Deri Gah | |
| 72. | “ | Mathantir Gah | |
| 73. | “ | Baro Gah | |
| 74. | “ | Chainter Gah | |
| 75. | “ | Dalnachi Gah | |
| 76. | “ | Khashter Gol | |
| 77. | “ | Chiantir Gah | |
| 78. | “ | Dain Gol | |
| 79. | “ | Hasis Gah | |
| 80. | “ | Charolai Gah | |
| 81. | “ | Singul Gah | |
| 82. | “ | Harnai Gah | |
| 83. | Glt | Chileli Gah | |
| 84. | “ | Kar Gah | |
| 85. | “ | Shinhai Gah | |
| 86. | “ | Shuko Gah | |

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| 87. | “ | Jutial Gah | |
| 88. | “ | Bai Gah | |
| 89. | “ | Shaimos | |
| 90. | “ | Kurkun Gah | |
| 91. | “ | Burmas Gah | |
| 92. | “ | Juyar Gah | |
| 93. | “ | Bular Gah | |
| 94. | “ | Hurpai Gah | |
| 95. | “ | Sai Nullah | |
| 96. | “ | Damot Gah | |
| 97. | “ | Dayor (Manu) Gah | |
| 98. | Nagir | Chaprot Nullah | |
| 99. | “ | Shilling Bar Nullah | |
| 100. | Hunza | Maiyun Nullah | |
| 101. | “ | Wesm-i-Dur | |
| 102. | “ | Shrine Yailaq Jilga | |
| 103. | “ | Kori Jilga | |
| 104. | “ | Kosh-i-Dur | |
| 105. | “ | Shorlik Jilga | |
| 106. | “ | Brakhun Jilga | |
| 107. | “ | Dih Jilga | |
| 108. | “ | Sho Sho In Dur | |
| 109. | “ | Shikar Jerab Nullah | |
| 110. | “ | Guri Dur | |
| 111. | “ | Dershal Jilga | |
| 112. | “ | Gordur-i-Jerab Nullah | |
| 113. | “ | Kolpuran Nullah | |
| 114. | Diamer | Barobas Gah | |
| 115. | “ | Paiyen Gah | |
| 116. | “ | Satil Gahl | |
| 117. | “ | Maichae Gah | |
| 118. | “ | Air Gah | |
| 119. | “ | Khichilo Gah | |
| 120. | “ | Gachar Gah | |
| 121. | “ | Labar Gah | |
| 122. | “ | Diamer Gah | |
| 123. | “ | Gayal Gah | |
| 124. | “ | Kuto Gah | |
| 125. | “ | Dudishal Gah | |
| 126. | “ | Khanbari Gah | |
| 127. | “ | Gichar Gah | |
| 128. | “ | Kinijut Gah | |
| 129. | “ | Thilkush Nalah | |
| 130. | “ | Dabot Nalah | |
| 131. | “ | Hodur Gah | |

| | | | |
|------|----------|-----------------|--|
| 132. | “ | Khiner Gah | |
| 133. | “ | Ke Ges Gah | |
| 134. | “ | Ame Ges Gah | |
| 135. | “ | Damachi Gah | |
| 136. | “ | Baro Gah | |
| 137. | “ | Susmo Gah | |
| 138. | “ | Makheli Nalah | |
| 139. | “ | Keo Gah | |
| 140. | “ | Buto Gah | |
| 141. | “ | Katai Gah | |
| 142. | “ | Buto Gah | |
| 143. | “ | Thak Nalah | |
| 144. | “ | Niat Gah | |
| 145. | “ | Bia Gah | |
| 146. | “ | Fasat Gah | |
| 147. | “ | Barai Gah | |
| 148. | “ | Biji Gah | |
| 149. | “ | Diamer Gah | |
| 150. | “ | Lichi Gah | |
| 151. | “ | Patro Gah | |
| 152. | “ | Jilipur Gah | |
| 153. | “ | Raikot Gah | |
| 154. | “ | Buldar Gah | |
| 155. | “ | Shaitan Gah | |
| 156. | Astore | Muskin Gah | |
| 157. | “ | Bunji Gah | |
| 158. | “ | Shaitan Nalah | |
| 159. | | Ramghat Channel | |
| 160. | “ | Shaltar Gah | |
| 161. | “ | Burdish Gah | |
| 162. | “ | Urdung Gah | |
| 163. | “ | Dirlung Gah | |
| 164. | “ | Dichil Gah | |
| 165. | “ | Bubin Nalah | |
| 166. | “ | Das Khiram Gah | |
| 167. | “ | Bulashbar Gah | |
| 168. | “ | Thue Gah | |
| 169. | “ | Ghishat Gah | |
| 170. | “ | Jari Niril | |
| 171. | “ | Shikong Gah | |
| 172. | “ | Chichi Gah | |
| 173. | “ | Rupal Gah | |
| 174. | Kharmang | Rambukha Lungma | |
| 175. | “ | Katichu Lungma | |
| 176. | Skardu | Baroiuma Gah | |

| | | | |
|------|---------|--------------------|----------------|
| 177. | “ | Stak Nalah | |
| 178. | “ | Sermik Nalah | |
| 179. | “ | Susustat Gah | |
| 180. | “ | Ganji Gah | |
| 181. | “ | Basho Nalah | |
| 182. | “ | Shagarthang Lungma | |
| 183. | “ | Dare Lungma | |
| 184. | “ | Bugwai Lungma | Deosai Plateau |
| 185. | “ | Piongway Lungma | Deosai Plateau |
| 186. | “ | Kalapani Nalah | Deosai Plateau |
| 187. | “ | Barwai Nalah | Deosai Plateau |
| 188. | | Shatung Nalah | Deosai Plateau |
| 189. | “ | Safaid Nalah | Deosai Plateau |
| 190. | “ | Shigar Nalah | Deosai Plateau |
| 191. | “ | Segad Nalah | Deosai Plateau |
| 192. | “ | Karopchi Nalah | Deosai Plateau |
| 193. | “ | Butkuei Nalah | Deosai Plateau |
| 194. | | Barra Pani | Deosai Plateau |
| 195. | | Chhota Pani | Deosai Plateau |
| 196. | | | |
| 197. | Shigar | Kero Lungma | |
| 198. | “ | Berelter Lungma | |
| 199. | “ | Ho Lungma | |
| 200. | “ | Biaho Lungma | |
| 201. | “ | Skora Lungma | |
| 202. | Ghanche | Daron Stream | |
| 203. | “ | Keris Lungma | |
| 204. | “ | Faranochan Lungma | |
| 205. | IOK | Yaldur | |
| 206. | “ | Tebe Lungma | |
| 207. | “ | Terong Topko | |
| 208. | “ | Dzing Lungma | |

**DISTRICT/YEAR WISE REGISTERED ANTI-TERRORISM ACT CASES IN
GILGIT BALTISTAN FROM 2004 TO 2015**

(DATA OBTAINED FROM SECRETARY HOME, GILGIT-BALTISTAN)

Gilgit

| Ser | Year | Registered cases | Challaned | Disposed off | Under investigation |
|--------------|-------------|-------------------------|------------------|---------------------|----------------------------|
| 1. | 2004 | 09 | 05 | 03 | 01 |
| 2. | 2005 | 166 | 83 | 68 | 15 |
| 3. | 2006 | 24 | 10 | 12 | 02 |
| 4. | 2007 | 06 | 04 | - | 02 |
| 5. | 2008 | 05 | 01 | 02 | 02 |
| 6. | 2009 | 43 | 25 | 02 | 16 |
| 7. | 2010 | 64 | 23 | 12 | 29 |
| 8. | 2011 | 52 | 18 | 07 | 27 |
| 9. | 2012 | 98 | 43 | 06 | 49 |
| 10. | 2013 | 13 | 05 | 01 | 07 |
| 11. | 2014 | 08 | 05 | - | 03 |
| 12. | 2015 | 23 | 15 | - | 08 |
| Total | | 511 | 237 | 113 | 161 |

Diamer

| Ser | Year | Registered cases | Challaned | Disposed off | Under investigation |
|--------------|-------------|-------------------------|------------------|---------------------|----------------------------|
| 1. | 2004 | - | - | - | - |
| 2. | 2005 | - | - | - | - |
| 3. | 2006 | - | - | - | - |
| 4. | 2007 | - | - | - | - |
| 5. | 2008 | - | - | - | - |
| 6. | 2009 | 04 | 02 | 02 | - |
| 7. | 2010 | 01 | - | - | 01 |
| 8. | 2011 | 05 | 02 | - | 03 |
| 9. | 2012 | 01 | 01 | - | - |
| 10. | 2013 | 04 | 04 | - | - |
| 11. | 2014 | 02 | 01 | - | 01 |
| 12. | 2015 | 20 | 16 | - | 04 |
| Total | | 37 | 26 | 02 | 09 |

Skardu

| Ser | Year | Registered cases | Challaned | Disposed off | Under investigation |
|------------|-------------|-------------------------|------------------|---------------------|----------------------------|
| 1. | 2004 | - | - | - | - |
| 2. | 2005 | - | - | - | - |

| | | | | | |
|--------------|------|-----------|-----------|-----------|----------|
| 3. | 2006 | - | - | - | - |
| 4. | 2007 | - | - | - | - |
| 5. | 2008 | - | - | - | - |
| 6. | 2009 | - | - | - | - |
| 7. | 2010 | - | - | - | - |
| 8. | 2011 | - | - | - | - |
| 9. | 2012 | - | - | - | - |
| 10. | 2013 | - | - | - | - |
| 11. | 2014 | - | - | - | - |
| 12. | 2015 | 04 | 03 | 01 | - |
| Total | | 04 | 03 | 01 | - |

Ghizer

| Ser | Year | Registered cases | Challaned | Disposed off | Under investigation |
|--------------|------|------------------|-----------|--------------|---------------------|
| 1. | 2004 | - | - | - | - |
| 2. | 2005 | - | - | - | - |
| 3. | 2006 | - | - | - | - |
| 4. | 2007 | - | - | - | - |
| 5. | 2008 | - | - | - | - |
| 6. | 2009 | - | - | - | - |
| 7. | 2010 | - | - | - | - |
| 8. | 2011 | - | - | - | - |
| 9. | 2012 | - | - | - | - |
| 10. | 2013 | - | - | - | - |
| 11. | 2014 | 01 | 01 | - | - |
| 12. | 2015 | 06 | 05 | - | 01 |
| Total | | 07 | 06 | - | 01 |

Astore

| Ser | Year | Registered cases | Challaned | Disposed off | Under investigation |
|-----|------|------------------|-----------|--------------|---------------------|
| 1. | 2004 | - | - | - | - |
| 2. | 2005 | - | - | - | - |
| 3. | 2006 | 06 | - | 06 | - |
| 4. | 2007 | - | - | - | - |
| 5. | 2008 | - | - | - | - |
| 6. | 2009 | - | - | - | - |
| 7. | 2010 | - | - | - | - |
| 8. | 2011 | - | - | - | - |
| 9. | 2012 | - | - | - | - |
| 10. | 2013 | 02 | 02 | - | - |
| 11. | 2014 | 01 | - | 01 | - |

| | | | | | |
|--------------|------|-----------|-----------|-----------|----------|
| 12. | 2015 | - | - | - | - |
| Total | | 09 | 02 | 07 | - |

Hunza

| Ser | Year | Registered cases | Challaned | Disposed off | Under investigation |
|--------------|------|------------------|-----------|--------------|---------------------|
| 1. | 2004 | - | - | - | - |
| 2. | 2005 | - | - | - | - |
| 3. | 2006 | - | - | - | - |
| 4. | 2007 | - | - | - | - |
| 5. | 2008 | - | - | - | - |
| 6. | 2009 | - | - | - | - |
| 7. | 2010 | - | - | - | - |
| 8. | 2011 | 16 | 07 | 07 | 02 |
| 9. | 2012 | 08 | 04 | - | 04 |
| 10. | 2013 | 01 | - | 01 | - |
| 11. | 2014 | 02 | 02 | - | - |
| 12. | 2015 | 01 | - | - | - |
| Total | | 28 | 13 | 08 | 06 |

Ghanche

| Ser | Year | Registered cases | Challaned | Disposed off | Under investigation |
|--------------|------|------------------|-----------|--------------|---------------------|
| 1. | 2004 | - | - | - | - |
| 2. | 2005 | - | - | - | - |
| 3. | 2006 | - | - | - | - |
| 4. | 2007 | - | - | - | - |
| 5. | 2008 | - | - | - | - |
| 6. | 2009 | - | - | - | - |
| 7. | 2010 | - | - | - | - |
| 8. | 2011 | - | - | - | - |
| 9. | 2012 | - | - | - | - |
| 10. | 2013 | - | - | - | - |
| 11. | 2014 | - | - | - | - |
| 12. | 2015 | 01 | 01 | - | - |
| Total | | 01 | 01 | - | - |

Nagar

| Ser | Year | Registered cases | Challaned | Disposed off | Under investigation |
|-----|------|------------------|-----------|--------------|---------------------|
| 1. | 2004 | - | - | - | - |
| 2. | 2005 | - | - | - | - |
| 3. | 2006 | - | - | - | - |

| | | | | | |
|--------------|------|-----------|----------|----------|-----------|
| 4. | 2007 | - | - | - | - |
| 5. | 2008 | - | - | - | - |
| 6. | 2009 | - | - | - | - |
| 7. | 2010 | - | - | - | - |
| 8. | 2011 | - | - | - | - |
| 9. | 2012 | 01 | - | - | 01 |
| 10. | 2013 | - | - | - | - |
| 11. | 2014 | - | - | - | - |
| 12. | 2015 | - | - | - | - |
| Total | | 01 | - | - | 01 |

Shigar

| Ser | Year | Registered cases | Challaned | Disposed off | Under investigation |
|--------------|------|------------------|-----------|--------------|---------------------|
| 1. | 2004 | - | - | - | - |
| 2. | 2005 | - | - | - | - |
| 3. | 2006 | - | - | - | - |
| 4. | 2007 | - | - | - | - |
| 5. | 2008 | - | - | - | - |
| 6. | 2009 | - | - | - | - |
| 7. | 2010 | - | - | - | - |
| 8. | 2011 | - | - | - | - |
| 9. | 2012 | - | - | - | - |
| 10. | 2013 | - | - | - | - |
| 11. | 2014 | - | - | - | - |
| 12. | 2015 | 01 | 01 | - | - |
| Total | | 01 | 01 | - | - |

Kharmang

| Ser | Year | Registered cases | Challaned | Disposed off | Under investigation |
|--------------|------|------------------|-----------|--------------|---------------------|
| 1. | 2004 | - | - | - | - |
| 2. | 2005 | - | - | - | - |
| 3. | 2006 | - | - | - | - |
| 4. | 2007 | - | - | - | - |
| 5. | 2008 | - | - | - | - |
| 6. | 2009 | - | - | - | - |
| 7. | 2010 | - | - | - | - |
| 8. | 2011 | - | - | - | - |
| 9. | 2012 | - | - | - | - |
| 10. | 2013 | - | - | - | - |
| 11. | 2014 | - | - | - | - |
| 12. | 2015 | - | - | - | - |
| Total | | - | - | - | - |

YEAR WISE SECTARAIN/TERRORISTS INCIDENT SINCE 2001

| | |
|--------------------|------------|
| Terrorist incident | 23 |
| Sectarian incident | 279 |
| Total | 302 |

| Ser | Year | Terrorists incident | Killed | Injured |
|--------------|------|---------------------|------------|------------|
| 1. | 2001 | - | - | - |
| 2. | 2002 | - | - | - |
| 3. | 2003 | 03 | 01 | 02 |
| 4. | 2004 | 01 | 02 | 12 |
| 5. | 2005 | 69 | 52 | 56 |
| 6. | 2006 | 08 | 04 | 02 |
| 7. | 2007 | 04 | 01 | 04 |
| 8. | 2008 | 08 | 04 | 04 |
| 9. | 2009 | 43 | 24 | 31 |
| 10. | 2010 | 37 | 09 | 29 |
| 11. | 2011 | 45 | 13 | 24 |
| 12. | 2012 | 60 | 39 | 77 |
| 13. | 2013 | 09 | 21 | 09 |
| 14. | 2014 | 05 | 06 | 14 |
| 15. | 2015 | 10 | - | 19 |
| Total | | 302 | 176 | 283 |

YEAR WISE TERRORIST/SECTARIAN INCIDENTS & LOSS OF LIFE IN GILGIT BALTISTAN SINCE 2001 TO 2015

| Ser | Year | Terrorist incident | | Sectarian incidents | | Total |
|-----|------|--------------------|---------|---------------------|---------|-------|
| | | Killed | Injured | Killed | Injured | |
| 1. | 2001 | - | - | - | - | - |
| 2. | 2002 | - | - | - | - | - |
| 3. | 2003 | - | - | 01 | 02 | 03 |
| 4. | 2004 | - | - | 02 | 12 | 14 |
| 5. | 2005 | 01 | - | 52 | 56 | 109 |
| 6. | 2006 | - | 03 | 04 | 02 | 09 |
| 7. | 2007 | - | - | 01 | 04 | 05 |
| 8. | 2008 | - | - | 05 | 04 | 09 |
| 9. | 2009 | - | - | 24 | 31 | 55 |
| 10. | 2010 | 01 | - | 09 | 29 | 39 |
| 11. | 2011 | - | - | 13 | 24 | 37 |

| | | | | | | |
|--------------|------|-----------|-----------|------------|------------|------------|
| 12. | 2012 | - | - | 25 | 55 | 80 |
| 13. | 2013 | 16 | 03 | 05 | 01 | 25 |
| 14. | 2014 | - | - | 06 | 14 | 20 |
| 15. | 2015 | 01 | 19 | - | 07 | 27 |
| Total | | 19 | 25 | 147 | 241 | 432 |

Security Personnel Killed

| Ser | LEAs | Killed |
|--------------|-----------|-----------|
| 1. | Police | 13 |
| 2. | Army | 02 |
| 3. | Rangers | 02 |
| 4. | GB Scouts | 01 |
| Total | | 18 |

Summary of 18 Injured Persons of Diamer District

| Ser | Detail | Injured |
|--------------|--|-----------|
| 1. | Terrotist attack on Police raiding party at Dodoshal on 11 Jun 2015 FIR#1/15 | 02 |
| 2. | Ts attack on Rangers post on 15 March 2015 FIR # 4/15 | 05 |
| 3. | Ts attack on LEAs during Nakabandi at Ranoi on 9 Nov 2015 FIR # 77/15 | 01 |
| 4. | Ts attack on Police team by High profile Ts Raheem Ullah alias on 15 Nov 2015 FIR# 34/15 | 10 |
| Total | | 18 |

| | |
|--------------|-----------|
| Police | 12 |
| Rangers | 05 |
| LEAs | 01 |
| Total | 18 |

COMPARATIVBE CRIME FIGURES FOR THE PERIOD FROM 01-01-2012 TO 31-12-2015 IN GILGIT BALTISTAN

| Serial | OFFENCE | 2015 | 2014 | 2013 | 2012 |
|-----------|-----------------------------|------|------|------|------|
| 1. | CRIME AGAINST PERSON | | | | |
| | Murder | 57 | 75 | 73 | 101 |
| | Attempt to Murder | 98 | 109 | 94 | 161 |
| | Karokari (Honor Killing) | 12 | 21 | 17 | 14 |
| | Hurt | 83 | 52 | 66 | 61 |
| | Rioting | 69 | 77 | 114 | 126 |
| | Assault on Public | 62 | 61 | 83 | 69 |

| | | | | | |
|--------------|--------------------------------|-------------|-------------|-------------|-------------|
| | Servant | | | | |
| | Rape | 01 | 08 | 02 | - |
| | Zina | 03 | 02 | - | - |
| | Gang Rape | - | - | - | 01 |
| | Kidnapping/Abduction | 34 | 25 | 30 | 33 |
| | Kidnapping for Ransom | 01 | - | 02 | - |
| | Suicide | 13 | 11 | 18 | 15 |
| | Attempt to Suicide | 07 | 06 | 14 | 09 |
| 2. | CRIME AGAINST PROPERTY | | | | |
| | DACOITY | 07 | 07 | 03 | 08 |
| | ROBBERY | 17 | 16 | 17 | 26 |
| | BURGLARY | 55 | 50 | 95 | 98 |
| | Motor Vehicle Theft | 12 | 13 | 11 | 06 |
| | Motor Cycle Theft | 34 | 36 | 46 | 39 |
| | Cattle Theft | 23 | 18 | 25 | 22 |
| | Other Theft | 61 | 66 | 85 | 73 |
| 3. | Local & Special Law | | | | |
| | Arm Act | 241 | 205 | 189 | 197 |
| | Prohibition Ordinance | 101 | 60 | 93 | 51 |
| | Smuggling | - | - | 01 | - |
| | Other Local & Special Laws | 07 | 05 | 19 | 16 |
| 4. | MISCELLANEOUS | | | | |
| | Fatal Accidents | 35 | 33 | 41 | 40 |
| | Non fatal accidents | 115 | 91 | 120 | 94 |
| | Miscellaneous | 364 | 309 | 850 | 305 |
| Total | | 1487 | 1329 | 1591 | 1551 |

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Hussain, Asif. Advocate. Interview by author. Khaplu, March 11, 2016.

Khan, Yahya. Chairman Board of Governor Thalay Local Support Organization (TSLO), Ghanche district. Interview by author. Daltir village, Thalay valley, Ghanche district, October 18, 2015.

Hassan, Muhammad. Vice President, Karakoram Disability Forum (KDF), Gilgit-Baltistan (based at Skardu). Interview by author. Roundo, Skardu, March 31, 2016.

The First Focus Group Discussion held at Hamzigund in Kharmang district on February 4, 2016. The first focus group table discussion on the subject where 13 person hailing from all parts and provinces of Pakistan. The discussion was intended to benefit from the views and observations of people not otherwise belonging to GB, yet having experience of residing in the area and enduring the toughness of geography and harshness of climate.

Ehsan Mehmood Khan, the author.

Muhammad Nadeem, government official.

Ammar Ali Raja, government official.

Adeel Ahmed, government official.

Amjad Ali, government official.

Irfan Afridi, government official.

Hamid Baig, government official.

Muhammad Arshad, government official.

Ali Raza, government official.

Muhammad Adnan, government official.

Muhammad Rizwan, government official.

Salahuddin, government official.

Qadeer Jan, government official.

The Second Focus Group Discussion held at Hushe in Khaplu district on February 21, 2016. The second focus group discussion on the subject was held at Hushe village in Khaplu district. Hushe is the highest village in Baltistan region of GB. A total of 6 persons participated in the discussion. The session was intended to benefit from the views, observations and lifetime experiences of the people who have endured toughness of geography and harshness of climate throughout their life as a community.

Ehsan Mehmood Khan, the author.

Ghulam Muhammad, General Manager, Baltistan Wildlife Conservation and Development Organization (BWCDO).

Salim Abbas, Operation Officer, The Baltistan Wildlife Conservation and Development Organization.

Haji Abdul Karim (aka Little Karim), Mountaineer and high altitude porter (known for having carried a 25-kg glider to Gasherbrum II (8035m).

Haji Rozi Ali, Ex Mountaineer and high altitude porter (now agriculturist and tourism guide).

Rozi Ali, Ex mountaineer and high altitude porter (now agriculturist and tourism guide).

The Third Focus Group Discussion held at Skardu on March 21, 2016. The third focus group discussion on the subject was held at Skardu. A total of 9 persons in addition to the author participated in the discussion. The session was intended to benefit from the views, empirical observations and experiences while discharging official responsibilities. The specific context of discussion was the role of geography in personal and community security subsets of human security in the realm of law and order in GB region.

Ehsan Mehmood Khan, the author.

Ehsan Bhutta, Home Secretary, Gilgit-Baltistan.

Muhammad Khan Shigri, Commissioner, Baltistan Division.

Syed Musa Raza, Deputy Commissioner, Skardu district.

Dr Fahad Mumtaz, Deputy Commissioner, Shigar district.

Basharat Hussain, Deputy Commissioner, Kharmang district.

Nadeem Nasir, Assistant Commissioner, Skardu.

Ishfaq Ahmed Khan, Deputy Inspector General Police, Baltistan Division.

Zahid Hussain, Superintendent Police, Kharmang district.

Gulfam Nasir, Senior Superintendent Police, Skardu district.

Unpublished Data and Documents

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Data obtained from Hamid Hussain, Executive Engineer, GB Public Works Department (Water and Power), Skardu on May 4, 2016.

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